



MODEL 2440

BROADCAST SEEDER/SPREADER



170 West 600 North

Shelbyville, Indiana 46176

800.458.9129

www.kascomfg.com



THANK YOU!

You have invested in the best implement of its type on the market today.

The care you give your Kasco and Herd equipment will greatly determine your satisfaction with its performance and its service life. We urge a careful study of this manual to provide you with a thorough understanding of your new implement before operating, as well as suggestions for operation and maintenance.

If your manual should become lost or destroyed, Kasco will be glad to provide you with a new copy. Please call us at 1-800-458-9129, or visit our website for an downloadable copy.

Because Kasco maintains an ongoing program of product improvement, we reserve the right to make improvements in design or changes in specifications without incurring any obligation to install them on units previously sold.

RETAIL CUSTOMER'S RESPONSIBILITY

It is the Retail Customer and/or Operator's responsibility to read the Operator's Manual, to operate, maintain and store the product in accordance with all instructions and safety procedures. Failure of the operator to read the Operator's Manual is a misuse of this equipment.

It is the Retail Customer and/or Operator's responsibility to inspect the product and to have any part(s) repaired or replaced when continued operation would cause damage or excessive wear to the other parts or cause a safety hazard.

It is the Retail Customer and/or Operator's responsibility to contact Kasco immediately for any warranty claims. Claims for warranty consideration must be made within seven (7) days of failure.

It is the Retail Customer and/or Operator's responsibility for any cost incurred by the dealer for traveling to or hauling of the product for the purpose of performing a warranty obligation or inspection.



LIMITED WARRANTY

Kasco Mfg. Co., Inc. warrants all its products marketed under the "Herd" name against defects in material and workmanship for ninety (90) days after date of retail purchase, except those components not manufactured by Kasco, as those parts are warranted only to the extent of the original manufacturer's warranty.

Should any part manufactured by Kasco prove defective within ninety (90) days from date of retail purchase, supposed defective part shall be returned freight paid to Kasco for consideration. If found to be defective by Kasco, credit will be issued through the proper channels, distributor and/or dealer.

Kasco will not assume liability for any labor costs, loss or damage caused by a defective part, consequential damages, or operational delays.

Altering or misuse of a part will void this warranty. Repairing a part without the expressed permission of Kasco voids this warranty.

Kasco neither assumes nor authorizes any person to assume for Kasco any other obligations or liability in connection with the sale of its equipment

Kasco reserves the right to make improvements in design or changes in specifications at any time without incurring any obligations to owners of equipment previously sold.

IMPORTANT SAFETY PRECAUTIONS

This symbol is used to call attention to safety precautions that should be followed by the operator to avoid accidents. When you see this symbol, carefully read the message that follows and heed its advice. Failure to comply with safety precautions could result in serious bodily injury.



Safety of the operator is one of the main concerns in designing and developing a piece of equipment. This product was designed by Kasco with as many safety features as possible. However, every year many accidents occur which could have been avoided by a few seconds of thought and a more careful approach to handling equipment. You, the operator, can avoid many accidents by observing the following precautions in this section. To avoid personal injury, study the following precautions and insist those working with you, and for you, follow them.

1. Read the Operator's Manual. Failure to read the Operator's Manual is considered a misuse of this equipment.
2. Become familiar with all the machine's controls and all the caution, warning, and danger decals affixed to the machine before attempting to start or operate.
3. Before starting or operating the machine, make a walk around inspection and check for obvious defects such as loose mounting bolts and damaged components. Correct any deficiency before starting.
4. Do not allow children to operate the implement. Do not allow adults to operate it without proper instruction.
5. Do not carry passengers.
6. Keep the area of operation clear of all persons, particularly small children and pets. The operator should cease operation whenever anyone comes within the area.
7. Lower the implement to the ground, stop tractor engine, and apply parking brake before leaving the vehicle.
8. Keep hands and feet away from implement.
9. Wear personal protective equipment such as, but not limited to, protection for eyes, ears, feet, hands, and head when operating or repairing the equipment. Do not wear loose clothing or jewelry that may catch on equipment's moving parts.
10. When performing adjustments or maintenance on the implement, first lower it to the ground or block it securely at a workable height.
11. Never stand between the tractor and implement when the tractor is being backed to the hitch.
12. Reduce speed when transporting implement to avoid bouncing and momentary loss of steering.
13. Use tractor flashing warning lights, day or night, when transporting implement on road or highways unless prohibited by law.
14. Use a rollover protective structure and seat belt equipped tractor for all implement operations.



***ALWAYS HEED ALL CAUTION
AND DANGER WARNINGS.***

INTRODUCTION AND DESCRIPTION

Introduction:

We are pleased to have you as a Kasco customer. We have engineered your broadcast seeder/spreader to provide our customers with the best performance with the least maintenance and down-time possible. Please read this manual completely and understand the operation of the seeder before using. Observe and obey all safety precautions noted. If you need any information, please contact us at 1-800-458-9129.

PREPARATION FOR USE

WARNING: To avoid serious injury or death, additional tractor front ballast may be needed for stable operation and transport of the seeder. See tractor operator's manual for recommended weights.



- 1) Gearbox is shipped from the factory with one pint of no. 90 multigear lubricant. Before use, check proper lubricant level. Remove plug and fill to plug level.
- 2) Cut the wires holding the power take-off shaft to the broadcaster in shipment. Then place the power take-off shaft on the gearbox shaft and secure it with the spring pin provided. For an extra precaution, run a wire through the spring pin after it is installed and secure it around the hub of the power take-off shaft.
- 3) Unwire the upper end of the push-pull cable (#1148) which is wired to the broadcaster for shipping. Then remove the clevis and one 3/4" jam nut and washer from the end of the cable. Insert the end of the cable into the hole in the bracket below the opening control arm. Reinstall the washer, jam nut, and clevis; move the opening control arm to the "0" setting on the number scale decal.
- 4) Adjust the clevis on the cable so that the pinhole and the clevis hole align and that the opening plate (#1024) inside the hopper is just closed. The clevis can be screwed in or out to accomplish this setting. Move the opening control arm by hand to ensure that all parts move freely. Install pull spring (#1124) by hooking the long open end that is fastened to the opening plate, coil end in the hole provided next to the cable. This spring will remove end-play in the cable. Install a hydraulic cylinder (not included) with 8" stroke; open and close cylinder to check for free movement, making sure that the #1024 opening plate does not over-close or cable damage will result.
- 5) Extend cylinder shaft fully and check that opening plate barely closes. If it does not, readjust at the clevis.
- 6) Depth-blocks can be used on the cylinder shaft for desired opening. 4" of shaft movement equals 1" of opening plate movement and will show equal amount on gauge setting chart.
- 7) Never lower the seeder so the power take-off shaft will come apart.
- 8) When raising the seeder for the first time, make sure the power take-off shaft does not bottom out. If it does, cut off equal amounts from both halves of the power take-off shaft.
- 9) The seeder is now ready to mount with a 3-point hitch.

INSTRUCTIONS for MOUNTING on TRACTOR WITH 3-POINT HITCH

1. The lift arms should be set for No. 2 Category, or 32-3/8" spacing sway bars. Blocks or chains must be used to prevent the seeder from swinging sideways.
2. Remove or move the drawbar to the side position, so as not to interfere with the power take-off shaft.
3. Install seeder on the two lower lift arms first, then attach the power take-off shaft to the tractor's PTO. **CAUTION:** Make sure the power take-off shaft is not too long. If the power take-off shaft is too long, it will bottom out and cause damage to the gearbox and related parts, and will not be covered by warranty. If the power take-off shaft is too long, cut the excessive length, ensuring to cut equal amounts of each half of shaft.
4. Connect the center link arm from the tractor to the seeder and adjust it so the fan is level or the top of the seeder is slightly tilted toward the tractor with the power take-off shaft being level from the tractor to the seeder.
5. If you wish to raise the seeder higher from the ground than having the power take-off shaft level or straight, do not raise the seeder any higher than would require the power take-off shaft to run at a 15 degree angle. Power take-off shaft and gearbox must run in the same plane.

INSTRUCTIONS for MOUNTING on TRACTOR WITH QUICK-HITCH

1. Install quick-hitch on tractor.
2. Bushings should be replaced on lower and upper mounting pins if they have been removed, or if they are needed for quick hitch.
3. Back tractor with quick-hitch under seeder. Raise quick-hitch slowly so that it will lock into all points.
4. Install the power take-off shaft to the tractor's PTO. **CAUTION:** Make sure the power take-off shaft is not too long. If the power take-off shaft is too long, it will bottom out and cause damage to the gearbox and related parts, and will not be covered by warranty. If the power take-off shaft is too long, cut the excessive length, ensuring to cut equal amounts of each half of shaft.
5. If you wish to raise the seeder higher from the ground than having the power take-off shaft level or straight, do not raise the seeder any higher than would require the power take-off shaft to run at a 15 degree angle. Power take-off shaft and gearbox must run in the same plane.

OPERATING INSTRUCTIONS and INSTRUCTIONS TO CENTER SPREAD PATTERN

1. Right-hand and Left-hand reference is determined by standing at the rear of the broadcaster and facing the direction of travel of tractor.
2. The model 2440 has a circular plate bolted to the base of hopper that is adjustable, for centering spread pattern. This plate is numbered from 1 to 9 and the numbers are found on the back side, on opposite side from the seed opening gauge. To move the adjustable plate, loosen four capscrews. Always be sure to tighten after adjusting. The normal setting for fertilizer is on 3-1/2, and be moved to a higher or lower number, depending upon the weight and quality of fertilizer being spread.
3. When spread pattern is heavy on the right side, move the base plate right, or clockwise, to a higher number. Do not move over one number before checking.
4. When spread pattern is heavy on the left side, move base plate left, or counterclockwise, to a lower number. Do not move over one number before checking.
5. Be sure the 4 capscrews are tightened evenly before adjusting.
6. In extreme conditions, to center the spread of material, the blades on the fan may be moved forward to carry more material to the left side. Always move all blades the same amount to assure even spreading. When the blades are moved back, this allows the material to spread more to the right side.
7. Bent fan blades will cause poor spreading. Replace when bent. The distance between the fan and base should never be farther than 2-10/32" or it will affect the spread. Replace in position as shipped from factory.
8. If material has a tendency to pack, it is best to fill the hopper in the field. If you must travel a longer distance, care should be taken when starting fan and agitator so that you do not shear off bolt in agitator or spring pin in PTO.

FOR SPREADING DOLOMITE OR DEHYDRATED LIME

1. Do Not Attempt to spread dolomite or dehydrated lime without the lime agitator (#158).
2. Install lime agitator in place of standard agitator.
3. Width of spread will be approximately 14 feet.
4. Under normal conditions, 1200 pounds of dolomite or dehydrated lime will go through a 1" opening width in six minutes.
5. **FILL HOPPER IN FIELD ONLY...DO NOT DRIVE ANY UNNECESSARY DISTANCE OR MATERIAL WILL PACK.**
6. Do not leave any material in hopper overnight or for any extended time, as material will pack.
7. Run tractor PTO normally at 540rpm. Under some conditions, the PTO may be run slower to keep dust down and will not affect the width of spread. Do not run PTO under 300rpm.
8. Do not use lime agitator for spreading regular fertilizer. Replace lime agitator with standard agitator for spreading fertilizer or broadcasting seeds.

MAINTENANCE/TROUBLESHOOTING

1. Before storing broadcast seeder/spreader, wash thoroughly with water, making sure all fertilizer has been removed. For complete cleaning, loosen four capscrews that hold base plate to bottom of hopper, so there is sufficient room to wash out all corrosive material. When dry, oil thoroughly. **Retighten plate before using.**
2. Separate the power take-off shaft halves and thoroughly oil tubing to prevent seizing during storage.
3. If spread is not wide enough, check for sheared pins.
4. Other reasons for poor spread width:
 - A. Bent Fan Blades
 - B. Fan Blades moved from factory setting. Blades should be in line with long marks on fan.
 - C. The distance between fan and base should never be farther than 2-10/32" or closer than 2-5/32".
 - D. Do not run PTO over 560rpm. Too much speed causes uneven spreads.
 - E. PTO Speed under 530rpm will result in a narrow spread.
5. When seeder does not feed evenly:
 - A. Check material for foreign matter.
 - B. Check to see that the agitator is bent down close to base plate, but do not let it strike base plate when rotating.
 - C. Opening may be set too close for material spreading.
 - D. Running agitator when not spreading will result in material being ground and packing. Do not over agitate.

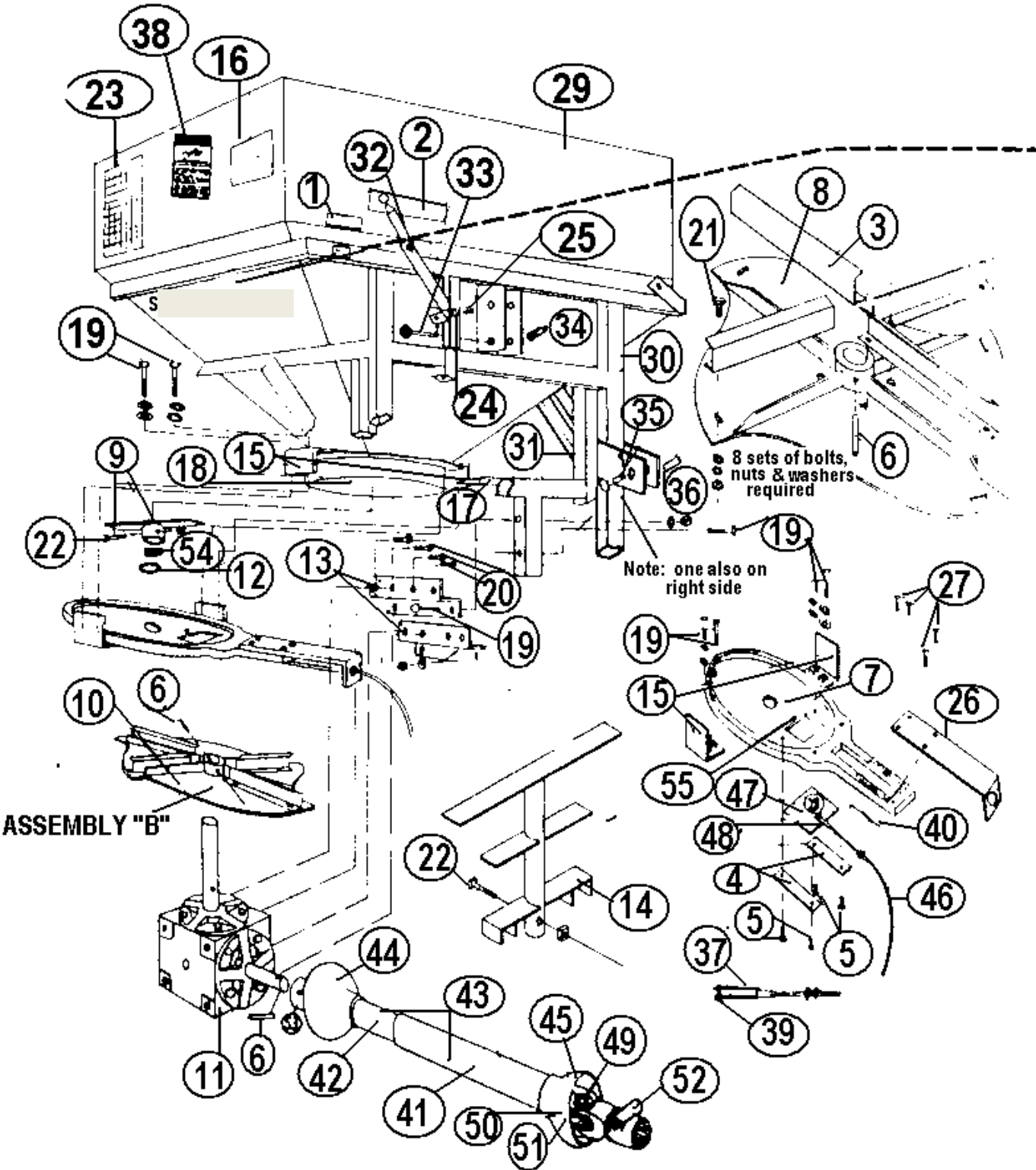
SEEDING CHART

(See decals on side of hopper for more seeds/fertilizer)

Seed	Open Width	Width of Spread (feet)	Pounds Per Acre/ Speed in MPH					
			5mph	6mph	7mph	8mph	9mph	10mph
Alfalfa	1/8"	28	12	10.8	9.6	8.4	7.2	6
Blue Grass	1/2"	18	16	14.4	12.8	11.2	9.6	8
Brome Grass	1/4"	10	7	6.3	5.6	4.9	4.2	3.5
Clover	1/8"	28	12	10.8	9.6	8.4	7.2	6
Hairy Vetch	1/4"	40	33	29.7	26.4	23.1	19.8	16.5
Hulled Lespedeza	1/8"	36	13	11.7	10.4	9.1	7.8	6.5
Meadow Fescue	1/4"	18	13.5	12.2	10.8	9.4	8.1	6.8
Oats	1/2"	33	86	77.4	66.8	60.2	51.6	43
Orchard Grass	1/4"	12	12	10.8	9.6	8.4	7.2	6
Piper Sudan - Sweet	1/4"	36	32	28.8	25.6	22.4	19.2	16
Rice	1/2"	33	180	162	144	126	108	90
Rye Grass	1/4"	18	13.5	12.2	10.8	9.4	8.1	6.8
Rye	1/2"	34	132	118.8	105.6	92.4	79.2	66
Soybeans	3/4"	40	120	108	96	84	72	60
Wheat	1/2"	34	132	108	105	92	79	66

Note: Seed chart is provided as a reference guide only. Variance in seeds and seeding conditions will change rates.

PARTS DRAWING—MODEL 2440 BROADCAST SEEDER/SPREADER



CAUTION: Keep all guards and shields in place at all times. Disengage power take-off and shutoff tractor engine before making any adjustments or repairs to seeder/spreader. Keep Hands, Fingers, and Loose Clothing well away from any and all moving parts at all times.

<u>Drawing Num-</u>	<u>Part Num-</u>	<u>Description</u>	<u>No. Required</u>
1	#99	Decal - Model 2440	1
2	#100	Decal for hydraulic opening chart	1
3	#102	Fan blade with bolt	4
4	#106	Seed gate guides	2
5	#107	1/4" x 1/2" Hex head capscrew	4
6	#111	5/16" x 2" Spring pin for PTO Shaft & Fan	2
7	#144	Base plate, aluminum	1
8	#145	Fan base, 1" bore	1
9	#147	Regular agitator with bolt and nut	1
10	#148	Fan complete with with pin ("Assembly B")	1
11	#2000	Gearbox complete for tractors with 540RPM	1
12	#152	Steel space washer, 1" bore, used in hopper on fan shaft	1
13	#154	Z Angles to carry gearbox, left side	2
	#153	Z Angles to carry gearbox, right side	2
14	#158	Lime agitator with bolt (OPTIONAL)	1
15	#159	L Base Clamp, lower	2
15A	#160	L Base Clamp, upper	2
16	#163	Fertilizer Instruction Decal	1
17	#207	Deflector, 24" long	1
18	#223	Hopper base ring (must be welded to hopper)	1
19	#418	1/2" x 3" machine bolt with nut, washer	8
20	#419	3/8" x 1" machine bolt - hardened	8
21	#420	5/16" x 3/4" carriage bolt, nut, lockwasher	8
22	#422	5/16" x 1-3/4" machine bolt, nut	1
23	#989C	Seeding chart decal	1
24	#1003	1" pin, for opening control arm to bracket	1
25	#1004	3" Hairpin cotter	1
26	#1007	Bracket, fastens cable to base plate	1
27	#1008	1/4" x 3/4" hex head capscrew	4
28	#1010	Opening plate with clevis, pin, and spacer	1
29	#1011	Hopper (not available separately)	1
30	#1012	Base frame (not available separately)	1
31	#1013	Gear case carrying frame (not available separately)	1
32	#1014	Opening control arm assm, with pointer and bracket	1
33	#1015	1" x 6" pin	1
34	#1016	Bushing for #1015 pin (1"ID x 1-1/4" OD)	1
35	#1017	1-1/8" x 6" Pin	2
36	#1018	Bushing for #1017 pin (1-1/8" ID x 1-3/8" OD)	2
37	#1112	Clevis, with pin and clevis pin	1
38	#1091	Warning decal	1
39	#1115	Hairpin cotter (1-1/4")	4
40	#1124	Pull spring for 48" cable	1
43	#1133P	Complete PTO shaft, 1-3/8" spline, 33" overall length	1
46	#1148	48" push-pull cable	1
47	#1024	Opening plate for hydraulic control	1
48	#1025	Clevis, spring pin, and spacer	1
54	#1123	Stainless steel compression spring	1
55	#1126	1/4" x 3/8" hexhead capscrew	1
	#273	Complete set of decals for 2440	1

Cylinder not included. Use ASAE Standard 8" stroke with 28.38" extended length between pin center lines.