

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 front center bearing post below the PTO shaft.
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. INC. | |
| MARSHFIELD, WIS. | |
| MOD. NO. | <input type="text"/> |
| SER. NO. | <input type="text"/> |
| DESCR. | <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

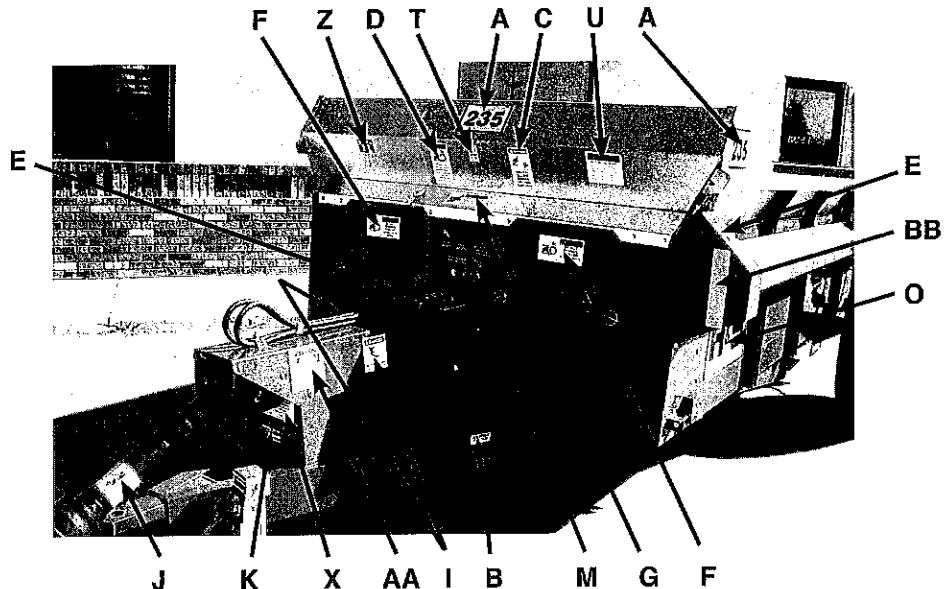
Your H&S Manure Spreader was manufactured with operator safety in mind. Located on the manure spreader are various decals to aid in operation, and warn of danger or caution areas. Pay close attention to all decals on your Manure Spreader.

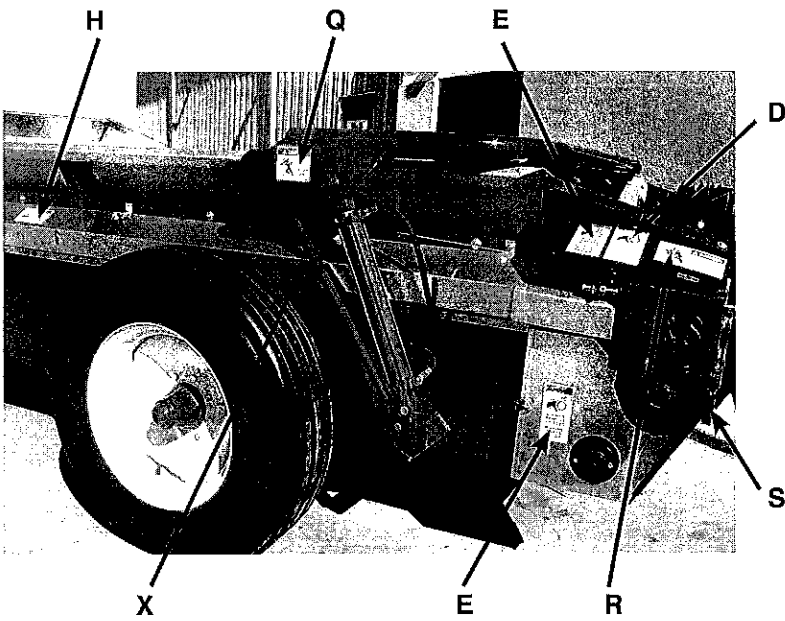
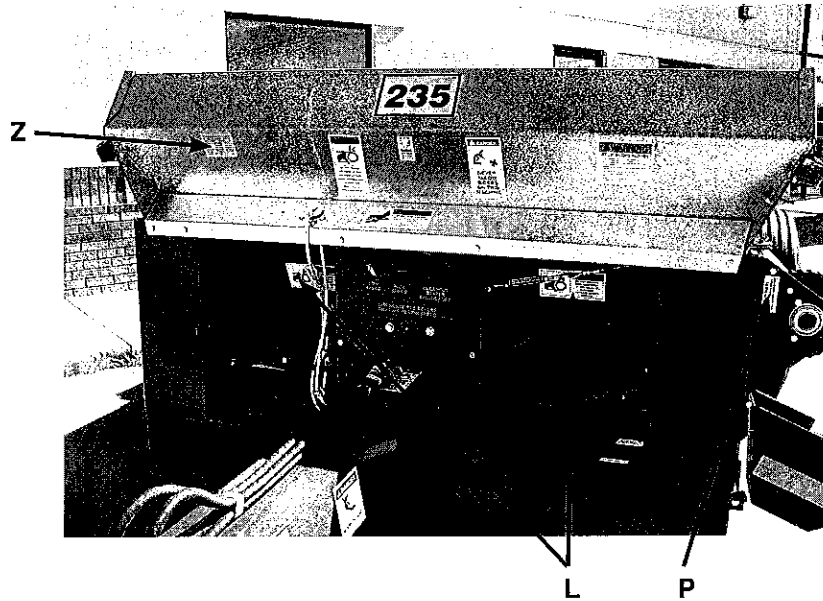


DO NOT REMOVE ANY OF THESE DECALS. IF DECALS ARE LOST, DAMAGED, OR IF MANURE SPREADER IS REPAINTED, REPLACE DECALS. REMEMBER: DECALS ARE FOR YOUR PROTECTION AND INFORMATION.

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

| ITEM | PART NO. | DESCRIPTION |
|-----------------|------------------|---|
| A | 10186C 10186D | (3) Model 235 (3) Model 270 |
| AA | 82602 | Warning - Crushing Hazard |
| B | 71188B | Jack Storage Position |
| BB | | Amber Reflector |
| C | 9194B | Danger - Never Allow Riders |
| D | 1494J | (2) Warning - Do Not Clean or Work |
| E | 1494K | (2) Warning - Do Not Remove Shields |
| F | 1494B | (2) Warning - Do Not Remove Shields |
| G | 11599 | Warning - Stay Clear of Leaks |
| H | 12794 | (2) Warning - Do Not Remove Shields |
| I | 9194A | (2) Danger - No Step - Stay Clear |
| J | Weasler | Danger - Rotating Driveline (H&S Decal 1494L) |
| K | | Serial Number |
| L | 1494A | (3) Warning - Do Not Operate |
| M | 82793 | Beater / Apron Control |
| N | 107-3185 | H&S Metal Sign (12x24) |
| O | 107-1186 | H&S Metal Sign (9x18) |
| P | 112-11176 | (2) Shear Bolts |
| Q | 111593C | (2) Danger - Stay Clear of Endgate Arms |
| R | 111593A | (2) Danger - Stay Clear of Beater |
| S | | (2) Red Reflector |
| T | FEMA | |
| U | 72203A | Warning - Help Avoid Injury |
| V | 093020 | (2) Grease |
| X | 71494A | (3) Warning - Do Not Operate |
| Z | H&S | Patent Numbers |
| | 72903-235 | Complete Set of Decals Model 235 |
| | 72903-270 | Complete Set of Decals Model 270 |
| Paint - H&S Red | ZX21 | Gallon |
| | ZX22 | Quart |
| | ZX23 | Pint |





Under Shield

Some Shields have been removed to identify decals. Make sure all shields are in place before operating spreader.

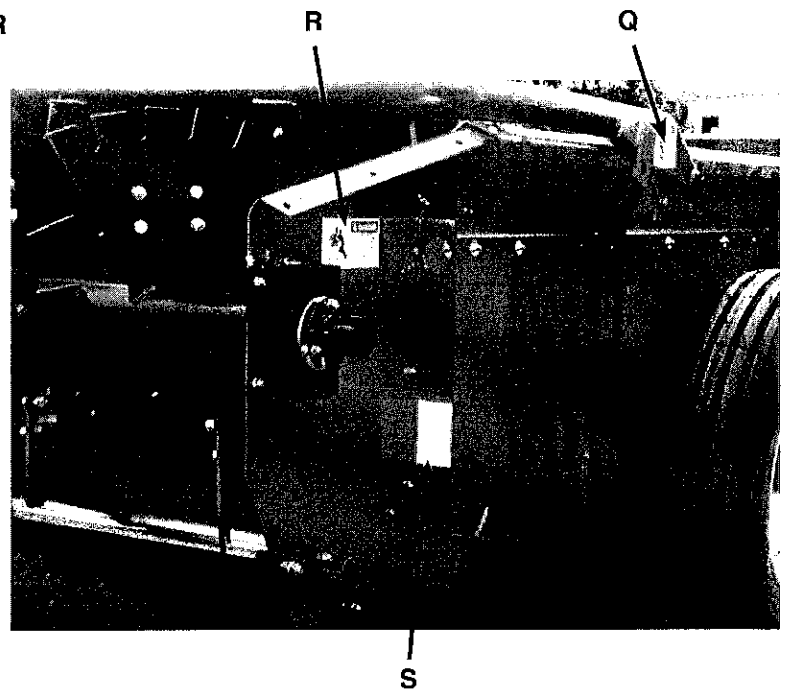
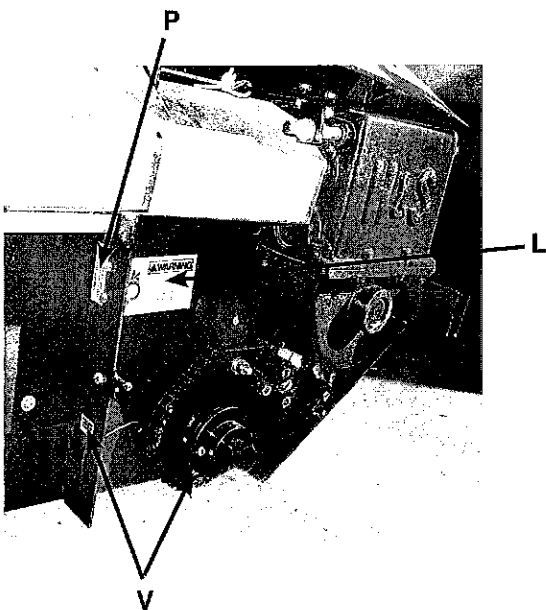


FIGURE 1

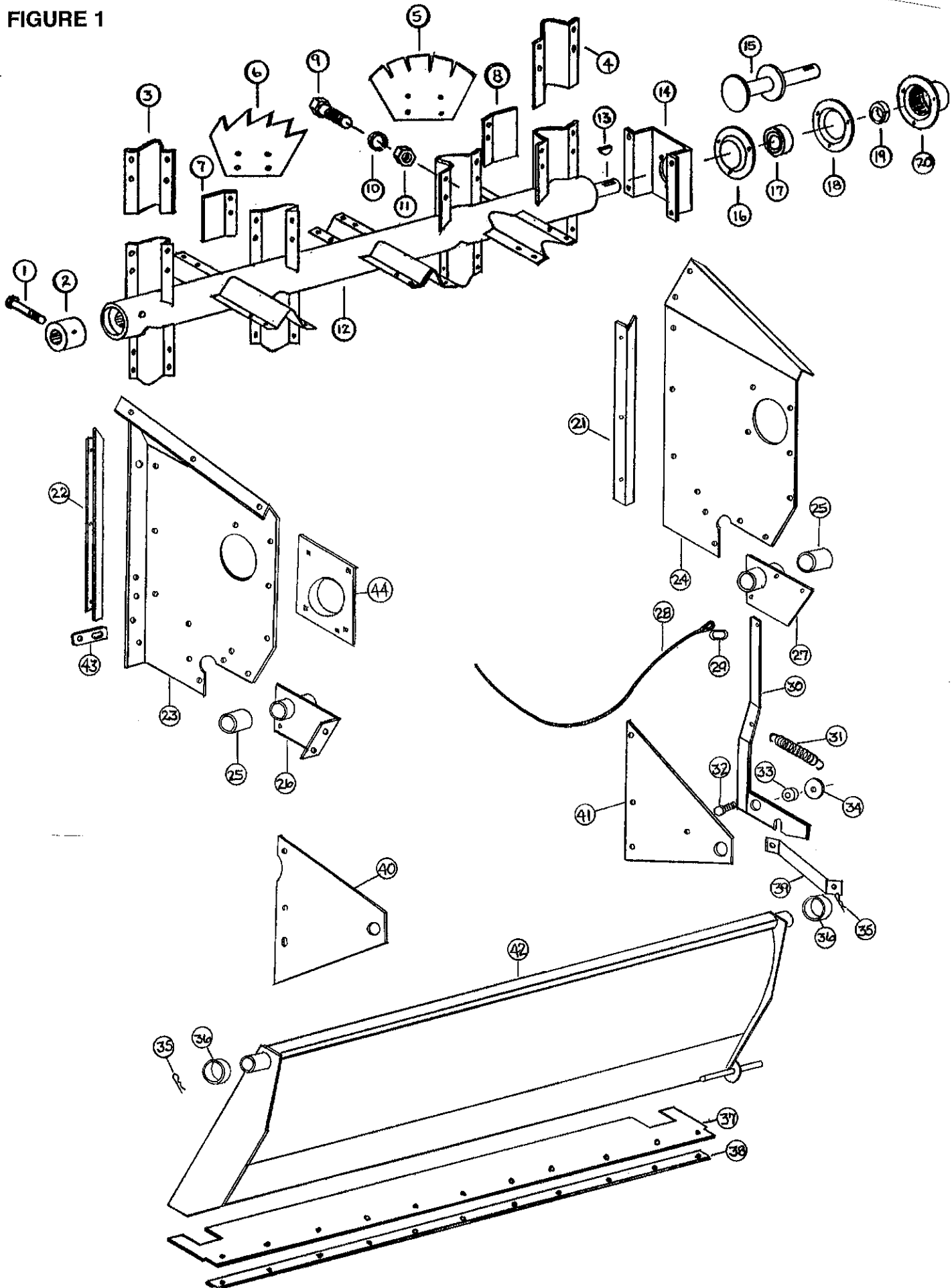


FIGURE 1
H&S MODELS 235 & 270
BEATER AND PAN ASSEMBLY
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|-------------|------------|------------|-----------------------------|
| 1. | 23N1 | " | 5/16" x 5" GR.5 Bolt |
| 2. | 23N2 | " | Splined Beater Insert |
| 3. | 23N3 | " | Beater Blade Holder LH |
| 4. | 23N4 | " | Beater Blade Holder RH |
| 5. | 23N276 | " | Beater Blade - Hardened |
| 6. | 23N277 | " | Beater Blade - Hardened |
| 7. | 23N7 | " | Beater Blade Wiper LH |
| 8. | 23N8 | " | Beater Blade Wiper RH |
| 9. | R10 | " | 1/2" x 1-1/4" Bolt GR.5 |
| 10. | R35 | " | 1/2" Lock Washer |
| 11. | R11 | " | 1/2" Lock Nut |
| 12. | 23N263 | " | Beater |
| 13. | 5B9 | " | 3/8" x 1-1/4" Woodruff Key |
| 14. | 23N10 | " | Beater Shaft Support |
| 15. | 23N11 | " | Beater Stub Shaft |
| 16. | F116 | " | Bearing Flange (Heavy Duty) |
| 17. | F115 | " | Bearing (Grease Type) |
| 18. | F114A | " | Bearing Flange w/Zerk 45° |
| 19. | F16 | " | Lock Collar |
| 20. | 23N12 | " | Bearing Flange Guard |
| 21. | 23N13 | " | RH Side Poly Hold down |
| 22. | 23N14 | " | LH Side Poly Hold down |
| 23. | 23N264 | " | LH Main Panel |
| 24. | 23N265 | " | RH Main Panel |
| 25. | 23N17 | " | Drive Shaft Bushing |
| 26. | 23N257 | " | Drive Shaft Bracket LH |
| 27. | 23N19 | " | Drive Shaft Bracket RH |
| 28. | 23N20 | 27N1 | Pan Trip Rope |
| 29. | R31 | " | Clip |
| 30. | 23N21 | " | Pan Trip Lever |
| 31. | R27 | " | Spring |
| 32. | 23N22 | " | 1/2" x 1-1/2" Carriage Bolt |
| 33. | 23N23 | " | Trip Lever Spacer |
| 34. | A34 | " | 1/2" Flat Washer |
| 35. | R70 | " | Cotter Pin |
| 36. | F112 | " | Spacer |
| 37. | 23N24 | " | Pan Rubber Flap |
| 38. | 23N25 | " | Pan Strap |
| 39. | 23N267 | " | Pan Support Brace |
| 40. | 23N268 | " | LH Pan Support |
| 41. | 23N29 | " | RH Pan Support |
| 42. | 23N30 | " | Pan |
| 43. | 23N64 | " | Shield Bracket |
| 44. | 17G10 | " | LH Anti-Wrap Guard |

NOTE: " (SAME PART NO. AS MODEL 235)

FIGURE 2

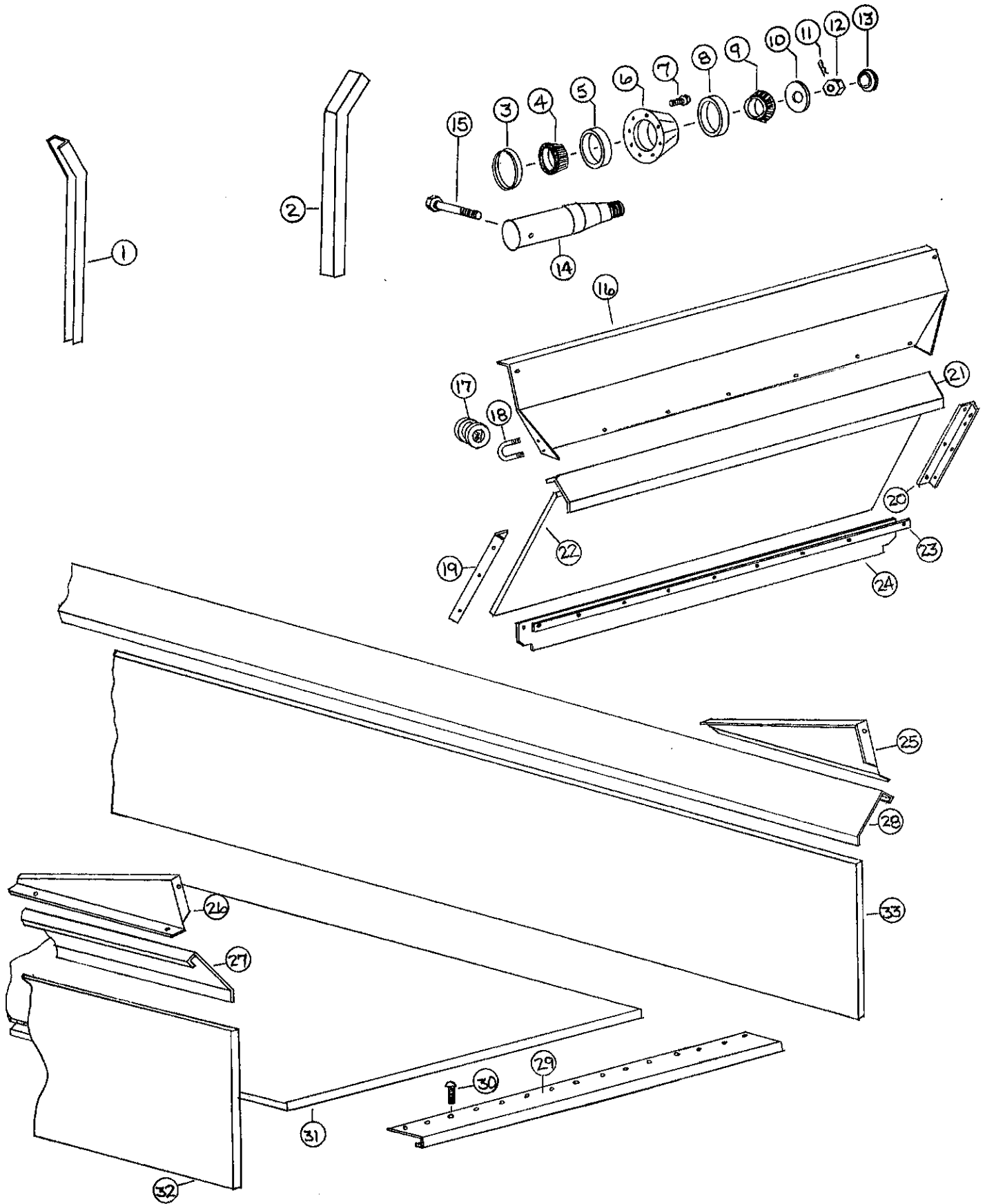


FIGURE 2
H&S MODELS 235 & 270
SPINDLE, HUB AND BOX PARTS
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|-------------|------------|------------|------------------------------------|
| 1. | 23N31 | " | RH Side Stake |
| 2. | 23N32 | " | LH Side Stake |
| 3. | B8 | B90 | Seal |
| 4. | B7 | B91 | Inner Bearing |
| 5. | B7A | B91A | Inner Race |
| 6. | B6 | 26G4 | Hub |
| 7. | B32 | B93 | Hub Bolt |
| 8. | B5A | B94A | Outer Race |
| 9. | B5 | B94 | Outer Bearing |
| 10. | B4 | " | Washer |
| 11. | B31 | " | Cotter Pin |
| 12. | B3 | " | Nut |
| 13. | B2 | " | Hub Cap |
| 14. | B9 | 27N2 | Spindle |
| Not Shown | 23N304 | 27N46 | Spindle for 14 x 16.1 Wheel |
| 15. | 23N53 | " | 1/2" x 4" Bolt GR.5 |
| 16. | 23N34 | " | Front Flare |
| 17. | F33 | " | Rope Guide |
| 18. | F32 | " | U-Bolt |
| 19. | 23N35 | " | RH Gate Angle |
| 20. | 23N36 | " | LH Gate Angle |
| 21. | 23N176 | " | Front Flare Support |
| 22. | 23N270A | " | Front Gate Plywood with Fiberglass |
| 23. | 23N40 | " | Strap for Rubber |
| 24. | 23N41 | " | Front Gate Rubber |
| 25. | 23N42 | " | Splash Guard Side LH |
| 26. | 23N43 | " | Splash Guard Side RH |
| 27. | 23N177 | 27N24 | RH Side Flare |
| 28. | 23N178 | 27N25 | LH Side Flare |
| 29. | 23N46 | " | Front Poly Floor Hold down |
| 30. | B106 | " | Bolts for Poly Floor |
| 31. | 23N271 | 27N36 | Floor Plywood with Poly |
| 32. | 23N272A | 27N37A | RH Side Plywood with Fiberglass |
| 33. | 23N273A | 27N38A | LH Side Plywood with Fiberglass |
| Not Shown | 12V36 | " | Wheel 14 x 16.1 |
| Not Shown | 23N54 | " | Tire 16.5 x 16.1 |
| Not Shown | 23N179 | " | Wheel 8 x 22.5 |
| Not Shown | MSO8C | " | Tire 295/75R 22.5 |
| Not Shown | 23N181 | 27N26 | Complete Frame |

NOTE: " (SAME PART NO. AS MODEL 235)

FIGURE 3

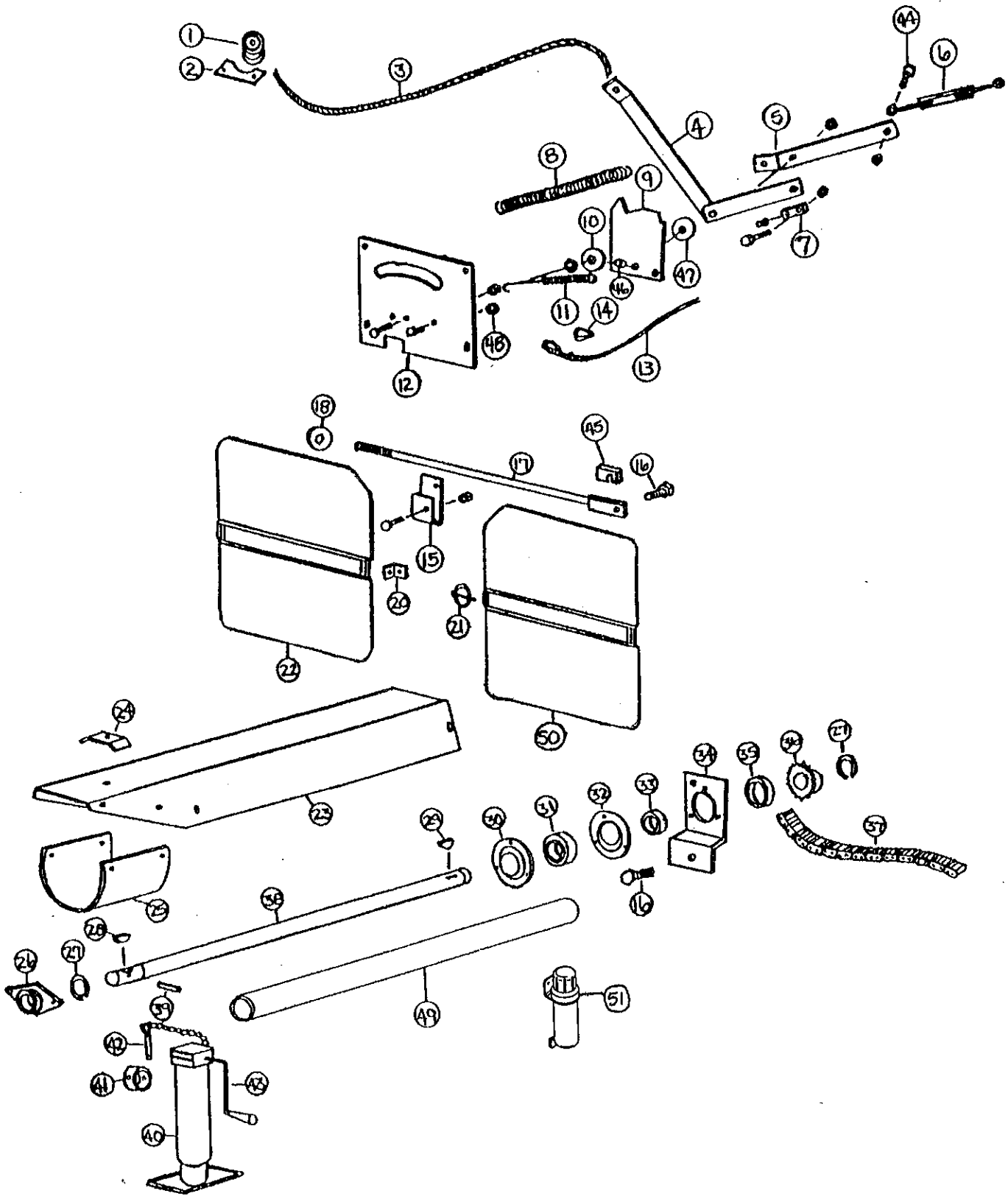


FIGURE 3
H&S MODELS 235 & 270
FRONT SHIELD AND DRIVE ASSEMBLY
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|------|--------|-------|------------------------------|
| 1. | F33 | " | Cable Guide |
| 2. | 23N182 | " | Bracket |
| 3. | 23N183 | " | Rope |
| 4. | 23N280 | " | Shifter Lever |
| 5. | 23N281 | " | Pivot Link |
| 6. | F84 | " | Turnbuckle |
| 7. | 23N282 | " | Shifter Dog |
| 8. | 10R14 | " | Spring |
| 9. | 23N283 | " | Stop Bracket |
| 10. | S304 | " | Washer |
| 11. | 23N284 | " | Shifter Dog Spring |
| 12. | 23N285 | " | Front Panel |
| 13. | 23N286 | 27N40 | Cable |
| 14. | F44 | " | Cable Loop |
| 15. | 23N287 | " | Spring Bracket |
| 16. | R10 | " | Bolt |
| 17. | 23N63 | " | Tightener Rod |
| 18. | F129 | " | Washer |
| 20. | F92 | " | Shield Bracket |
| 21. | F56 | " | Clip Pin |
| 22. | 23N305 | " | Front Shield RH |
| 23. | 23N66 | " | Shield |
| 24. | 23N67 | " | Tailgate Hose Bracket |
| * | HE42 | " | Hydraulic Drive Bracket |
| 25. | F54 | " | Shield |
| 26. | 12N29 | " | Bearing |
| 27. | F73 | " | Snap Ring |
| 28. | 5B10 | " | 1/4" x 1" Key |
| 29. | 5B9 | " | 3/8" x 1-1/4" Key |
| 30. | F114 | " | Flange w/Zerk |
| 31. | F115 | " | Bearing (Grease Type) |
| 32. | F14 | " | Bearing Flange |
| 33. | F16 | " | Lock Collar |
| 34. | 23N68 | " | Front Adjustment Plate |
| 35. | 23N69 | " | Spacer |
| 36. | 23N70 | " | 25 Tooth Sprocket |
| 37. | 23N245 | " | #60 Roller Chain 125 Pitches |
| 38. | 23N72 | " | Front Shaft |
| 39. | F26 | " | 5/16" x 2-1/4" Roll Pin |
| 40. | 12N116 | 27N49 | Jack |
| * | 12N120 | " | Jack Gear Rep. Kit |
| 41. | 12N121 | 27N51 | Jack Mount |
| 42. | 12N117 | 27N50 | Jack Pin |
| 43. | 12N119 | " | Handle |
| * | 12N118 | " | Replacement Bearing |
| 44. | BFR247 | " | Carriage Bolt 3/8" x 1" GR.5 |
| 45. | 23N278 | " | Spacer |
| 46. | 23N297 | " | Roller |
| 47. | S304 | " | Washer |
| 48. | ST81 | " | Spacer (2) |
| 49. | 37N74 | " | Front Shaft Guard |
| 50. | 23N306 | " | Front Shield LH |
| 51. | S522 | " | Manual Holder |

NOTE: " (SAME PART NO. AS MODEL 235)
*** (PART NOT SHOWN)**

FIGURE 4

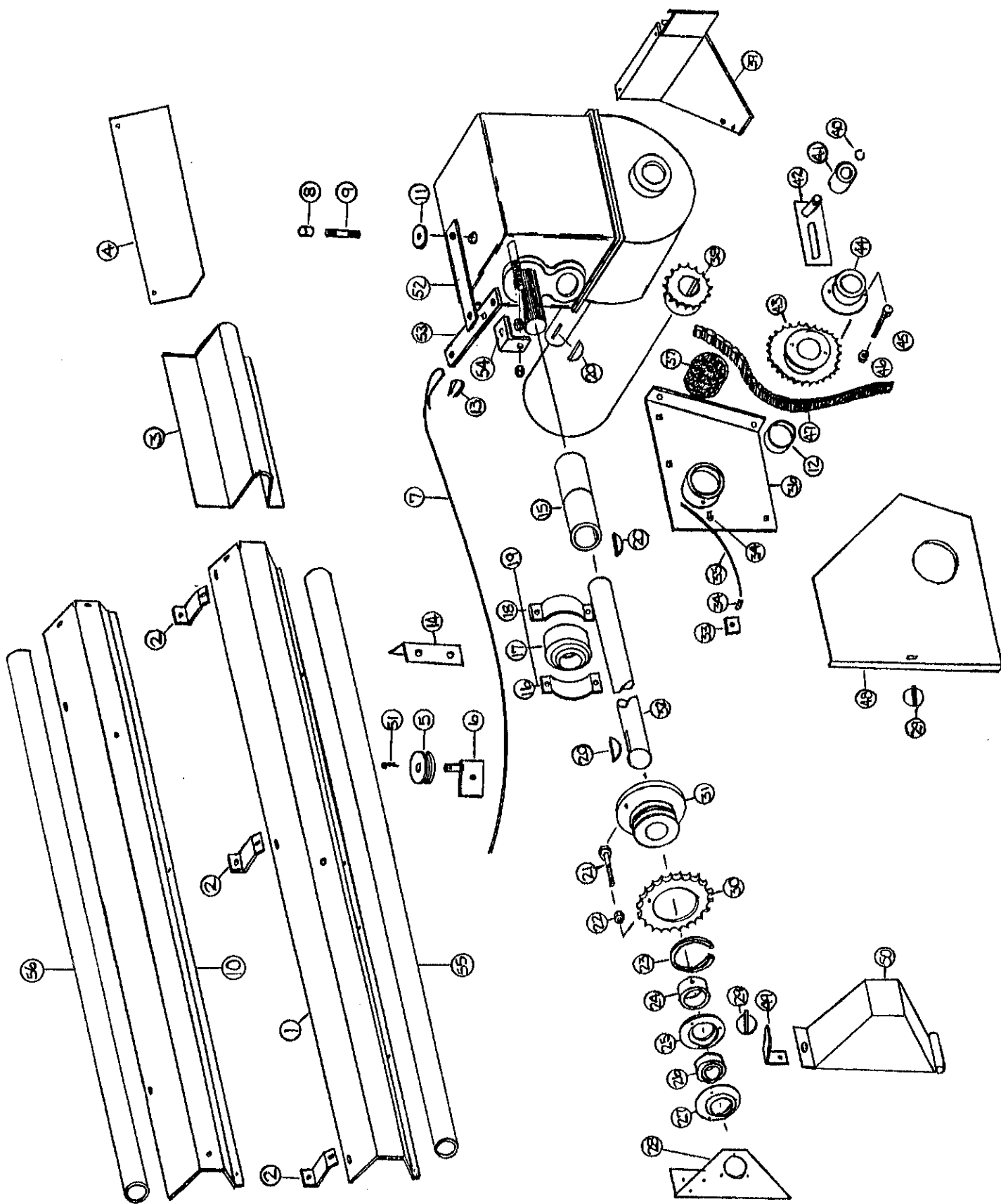


FIGURE 4
H&S MODELS 235 & 270
BACK SHIELDS AND DRIVE ASSEMBLY
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|------|--------|-------|-------------------------------------|
| 1. | 23N247 | 27N39 | Side Shield |
| 2. | 23N248 | " | Side Shield Bracket |
| 3. | 23N292 | " | Coupler Shield |
| 4. | 23N250 | " | Poly Shield |
| 5. | 23N251 | " | Poly Pulley |
| 6. | 23N252 | " | Pulley Mount |
| 7. | 23N253 | 27N32 | Cable |
| 8. | 17G58 | " | Vent Cap |
| 9. | 23N288 | " | Pipe Nipple |
| 10. | - | 27N34 | Back Side Shield |
| 11. | 17G61 | " | Washer |
| 12. | 23N266 | " | Pipe Spacer |
| 13. | F44 | " | Cable Loop |
| 14. | 23N269 | " | Bearing Bracket |
| 15. | 17G65 | " | Coupler |
| 16. | 12N35 | " | Holder |
| 17. | 12N33 | " | Bearing |
| 18. | 12N34 | " | Bearing Cover |
| 19. | 12N36 | " | Complete Assembly |
| 20. | 5B9 | " | 3/8" x 1-1/4" Woodruff Key |
| 21. | D31 | " | Shear Bolt |
| 22. | D81 | " | Lock Nut |
| 23. | 23N189 | " | Snap Ring |
| 24. | F16 | " | Lock Collar |
| 25. | F114A | " | Flange |
| 26. | F115 | " | Bearing (Grease Type) |
| 27. | F14 | " | Bearing Flange |
| 28. | 23N254 | " | Bearing Plate |
| 29. | F56 | " | Clip Pin |
| 30. | 23N191 | " | 30 Tooth Sprocket |
| 31. | 23N190 | " | Shear Hub |
| 32. | 23N255 | 27N33 | Side Shaft |
| 33. | 16V9 | " | Grease Zerk Block |
| 34. | S47 | " | Grease Line Fitting |
| 35. | 23N256 | " | Grease Line |
| 36. | 23N257 | " | LH Drive Shaft Mount |
| 37. | 23N258 | " | Chain Oiler |
| 38. | 17G67 | " | Worm Gear Sprocket |
| 39. | 23N259 | " | Gearbox Brace |
| 40. | 10R32 | " | Snap Ring |
| 41. | 23N238 | " | Chain Tightener Roller |
| 42. | 17G69 | " | Chain Tightener Bracket |
| 43. | 17G68 | " | Shear Hub Sprocket - Standard (32T) |
| * | 17G170 | " | Slow Down Sprocket (40T) |
| * | 23N279 | " | Speed Up Sprocket (25T) |
| 44. | 17G71 | " | Shear Hub |
| 45. | D31 | " | Shear Bolt |
| 46. | D81 | " | Lock Nut |
| 47. | 23N260 | " | #60 Chain 56 Pitches |
| 48. | 23N261 | " | Drive Shield |
| 49. | 23N242 | " | Shield Angle |
| 50. | 22G21 | " | Shield |
| 51. | X43 | " | Cotter Pin |
| 52. | 23N289 | " | Shifter Rod Lever Fulcrum |
| 53. | 23N290 | " | Shifter Rod Lever |
| 54. | 23N291 | " | Shifter Rod Angle |
| 55. | 23N294 | 27N41 | 1st Side Shaft Guard |
| 56. | 23N295 | 27N42 | 2nd Side Shaft Guard |
| *57. | - | 27N43 | 3rd Side Shaft Guard |
| *58. | - | 27N44 | 4th Side Shaft Guard |

NOTE: " (SAME PART NO. AS MODEL 235)
 - (PART IS NOT USED ON THIS MODEL)
 * (PART IS NOT SHOWN)

FIGURE 5

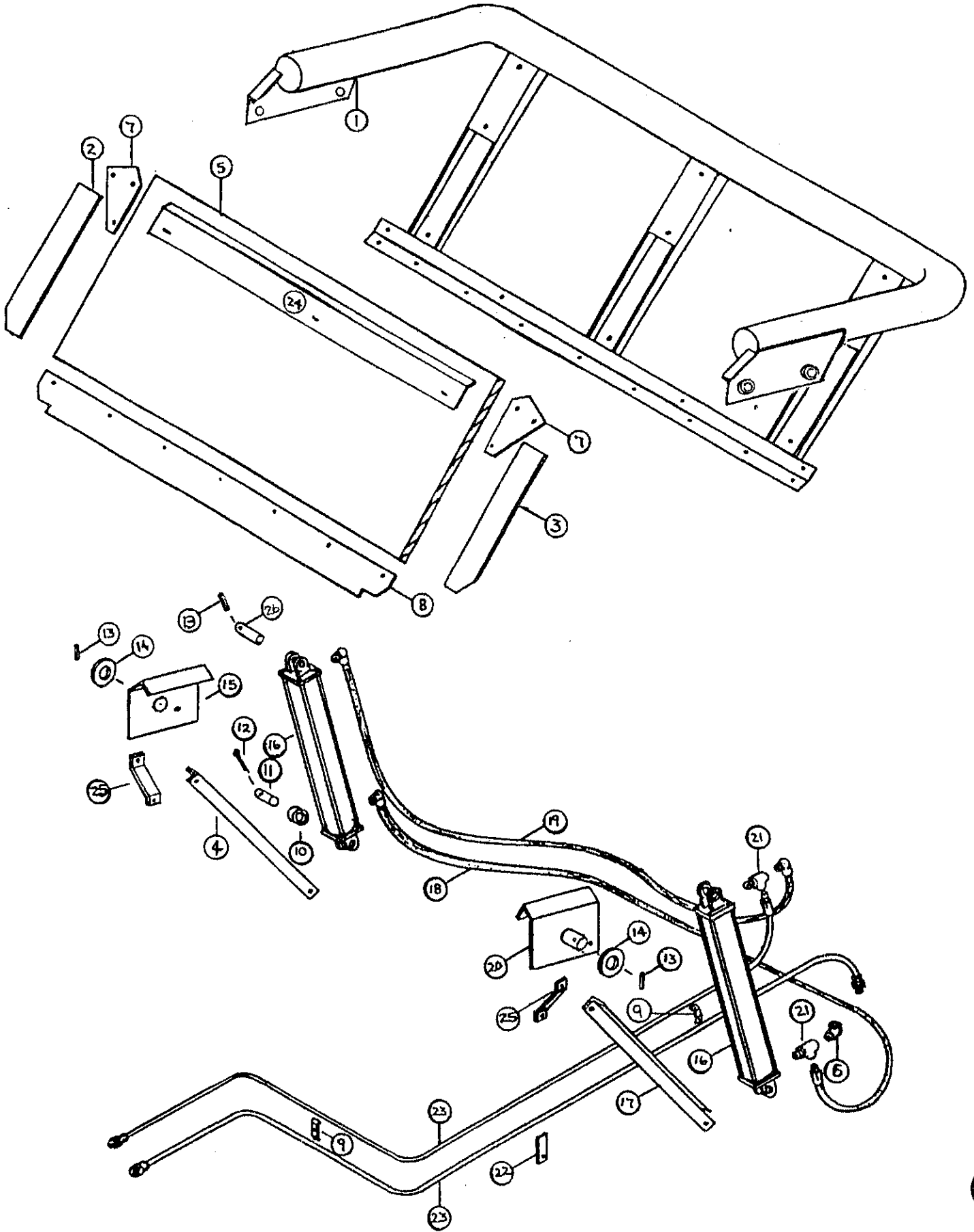


FIGURE 5
H&S MODELS 235 & 270
HYDRAULIC TAILGATE ASSEMBLY
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|-------------|------------|------------|-------------------------------------|
| 1. | 23N298 | " | Tailgate Frame |
| 2. | 23N99 | " | RH Side Rubber |
| 3. | 23N100 | " | LH Side Rubber |
| 4. | 23N233 | " | Tailgate Bracket Brace |
| 5. | 23N274A | " | Tailgate Plywood with Fiberglass |
| 6. | 23N234 | " | 90° Street Elbow 3/8" |
| 7. | 23N104 | " | Tailgate Corner |
| 8. | 23N105 | " | Bottom Rubber |
| 9. | 23N67 | " | Hose Bracket |
| 10. | K132 | " | Spacer |
| 11. | 23N107 | " | Cylinder Pin |
| 12. | 23N108 | " | Cotter Pin |
| 13. | 3G22 | " | Roll Pin 5/16"x1-3/4" |
| 14. | 23N109 | " | Washer |
| 15. | 23N299 | " | RH Tailgate Mount |
| 16. | 23N111A | " | Hydraulic Cylinder |
| 17. | 23N231 | " | Brace |
| 18. | 23N113 | " | Hose (96") |
| 19. | 23N114 | " | Hose (138") |
| 20. | 23N300 | " | LH Tailgate Mount |
| 21. | 23N116 | " | Tee |
| 22. | 23N117 | " | Hose Holder |
| 23. | 23N307 | 27N47 | Hose (23N307 - 274" / 27N47 - 298") |
| 24. | 23N163 | " | Tailgate Poly Hold down |
| 25. | 23N232 | " | Tailgate Bracket Brace |
| 26. | 23N301 | " | Cylinder Pin |

NOTE: " (SAME PART NO. AS MODEL 235)

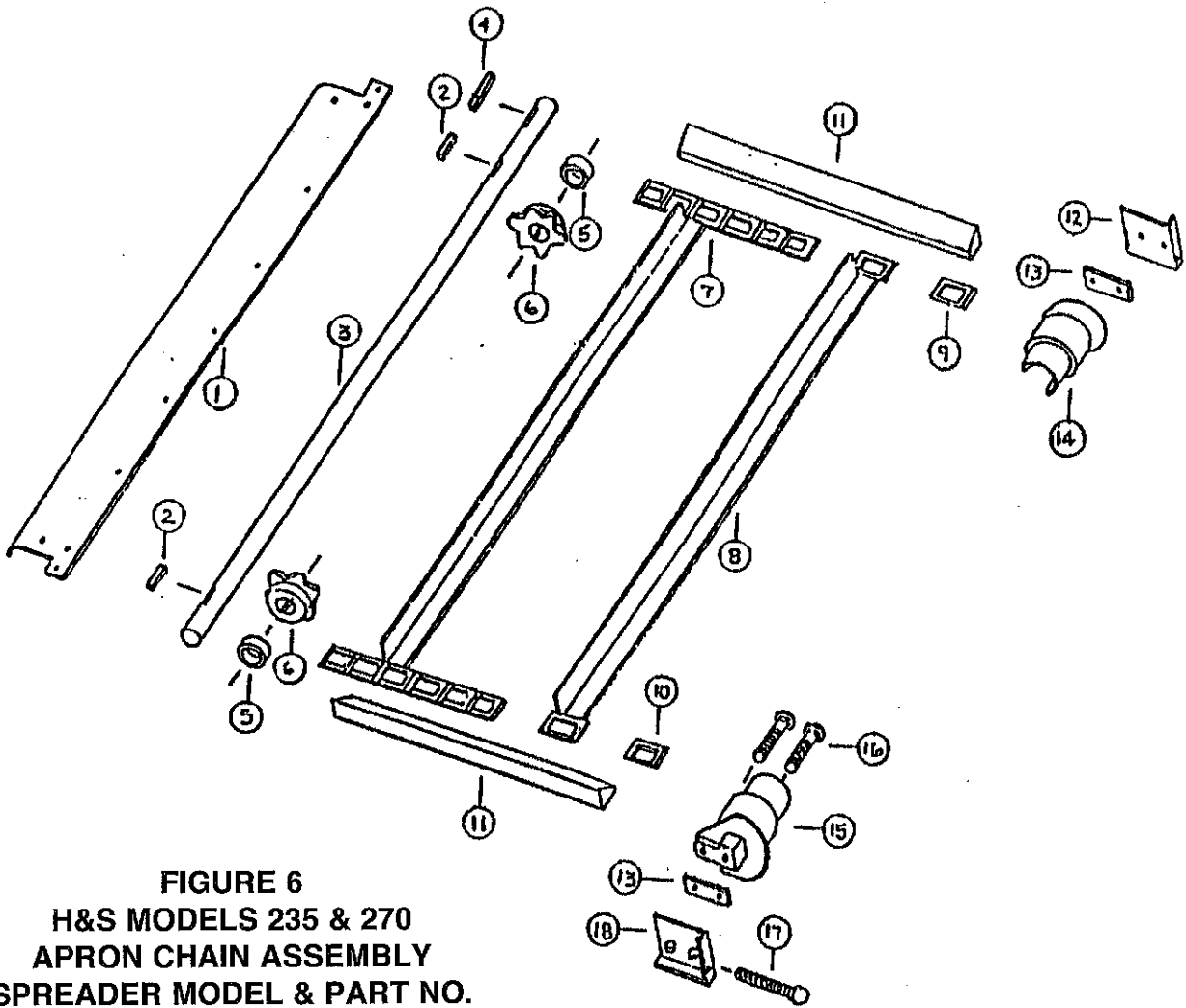


FIGURE 6
H&S MODELS 235 & 270
APRON CHAIN ASSEMBLY
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|------|--------|-------|---------------------------------------|
| 1. | 23N119 | " | Rear Poly Hold down |
| 2. | 23N303 | " | 3/8" x 1-3/4" Square Key |
| 3. | 23N262 | 27N35 | Drive Shaft |
| 4. | A32 | " | 3/8" x 1-3/8" Square Key w/Round Ends |
| 5. | 23N121 | " | Spacer |
| 6. | 23N122 | " | Drive Sprocket 6T |
| 7. | 23N123 | - | Apron Chain 17 Slats, 210 Links |
| | - | 27N20 | Apron Chain 20 Slats, 244 Links |
| 8. | 23N124 | " | Slat w/Attachment Links |
| 9. | S55 | " | T-Rod Standard Link |
| 10. | S56 | " | T-Rod Chain Side Spacers |
| 11. | 23N125 | 27N21 | Apron Chain Side Spacers |
| 12. | A30 | " | Chain Slide Plate |
| 13. | 23N126 | " | Chain Slide Spacer |
| 14. | 23N127 | " | T-Rod Slide LH |
| 15. | 23N128 | " | T-Rod Slide RH |
| 16. | 23N129 | " | 1/2" x 4" Carriage Bolt GR.5 |
| 17. | 23N130 | " | 1/2" x 4-1/2" Bolt GR.5 |
| 18. | A29 | " | Chain Slide Plate |

NOTE: " (SAME PART NO. AS MODEL 235)
 - (PART IS NOT USED ON THIS MODEL)

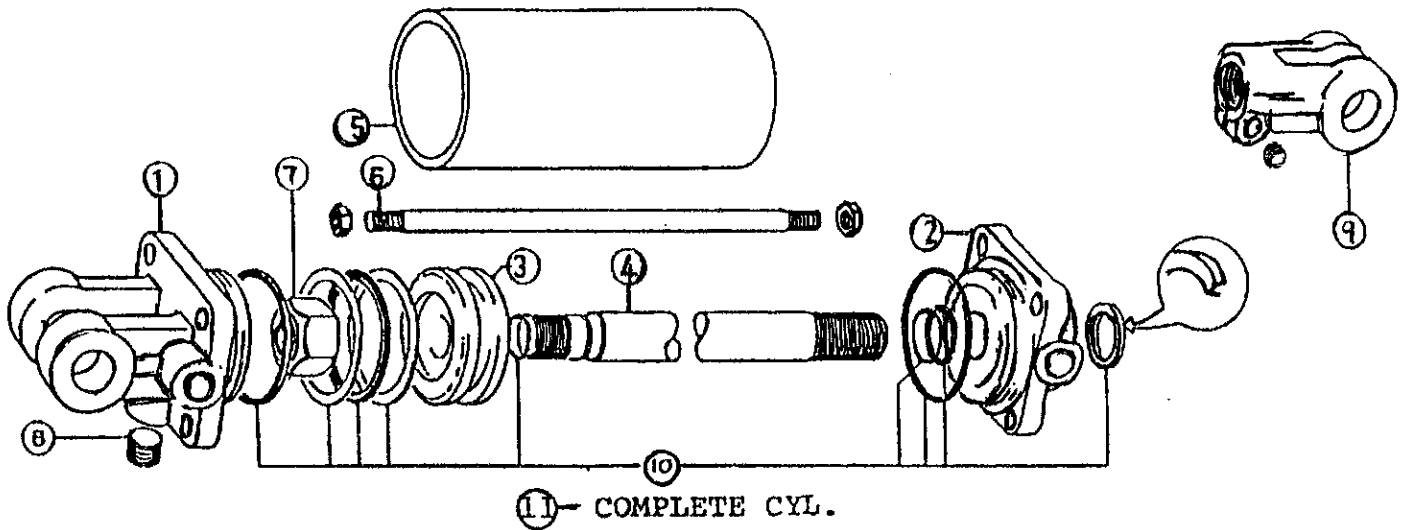


FIGURE 7
H&S MODELS 235 & 270
HYDRAULIC CYLINDER
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|------|---------|-----|--------------------|
| 1. | 23N142A | " | Clevis Cap |
| 2. | 23N143A | " | Rod Cap |
| 3. | 23N144 | " | Piston |
| 4. | 23N145A | " | Rod |
| 5. | 23N146 | " | Cylinder Tube |
| 6. | 23N147 | " | Tie Rod |
| 7. | 23N148 | " | Piston Nut |
| 8. | 23N149 | " | Plug |
| 9. | 23N150A | " | Rod Clevis |
| 10. | 23N151 | " | Seal Kit |
| 11. | 23N111A | " | Hydraulic Cylinder |

NOTE: " (SAME PART NO. AS MODEL 235)

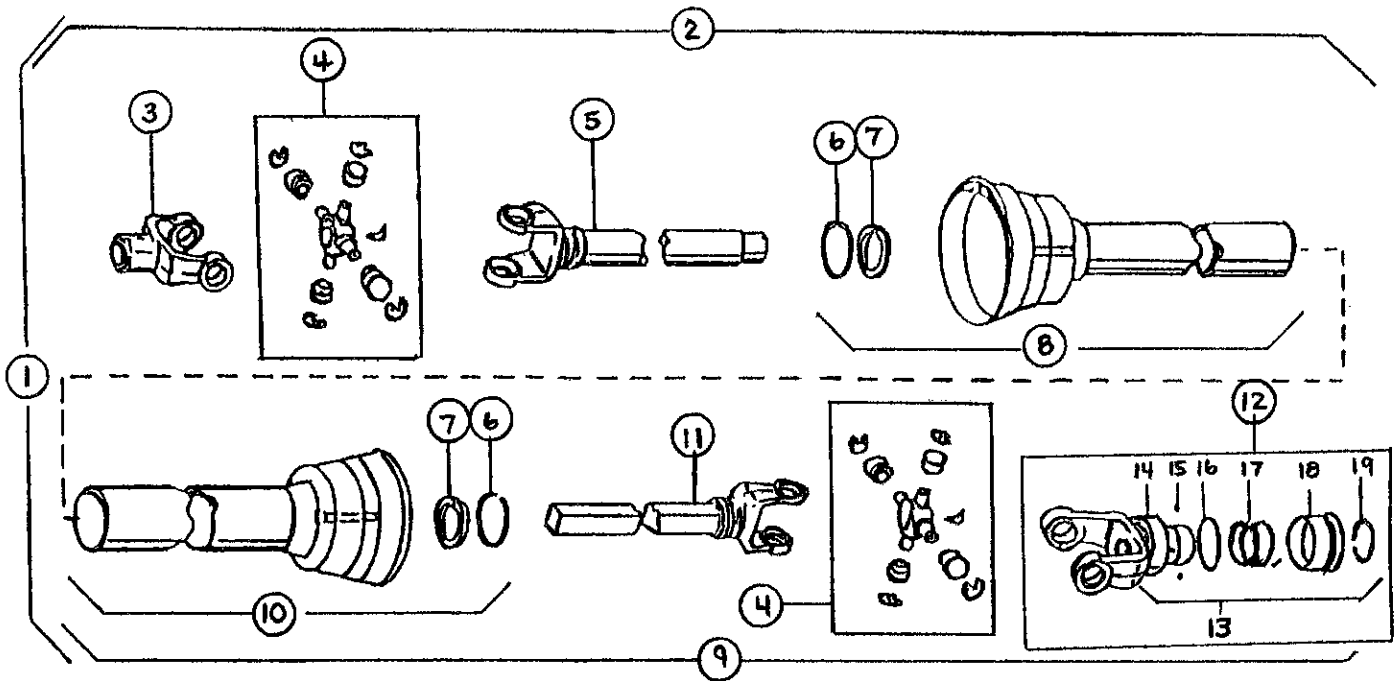


FIGURE 8
H&S MODELS 235 & 270
PTO ASSEMBLY
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|------|---------|-----|------------------------------------|
| 1 | 23N152 | " | PTO Assembly Complete w/Shields |
| 2 | 23N153 | " | Machine Half PTO w/Shield |
| 3 | G1R35 | " | End Yoke Machine Half |
| 4 | 14NWKIT | " | Repair Kit |
| 5. | 23N155 | " | Yoke and Tube |
| 6 | 24N26 | " | Bearing Retainer |
| 7 | 4N20 | " | Nylon Bearing |
| 8 | 23N156 | " | Inner Guard Including Item #6 & #7 |
| 9 | 23N157 | " | Tractor Half PTO w/Shield |
| 10. | 23N158 | " | Outer Guard Including Item #6 & #7 |
| 11 | 23N159 | " | Yoke and Shaft |
| 12 | 23N162 | " | Lock Yoke Assembly |
| 13 | S225 | " | Spring Lock Repair Kit |
| 14 | S226 | " | Cover |
| 15. | S212 | " | Stainless Ball |
| 16 | S227 | " | Washer |
| 17 | S228 | " | Spring |
| 18 | S229 | " | Collar Assembly |
| 19 | S215 | " | Retaining Ring |
| * | S402 | " | PTO Safety Manual |

NOTE: " (SAME PART NO. AS MODEL 235)

*** (PART IS NOT SHOWN)**

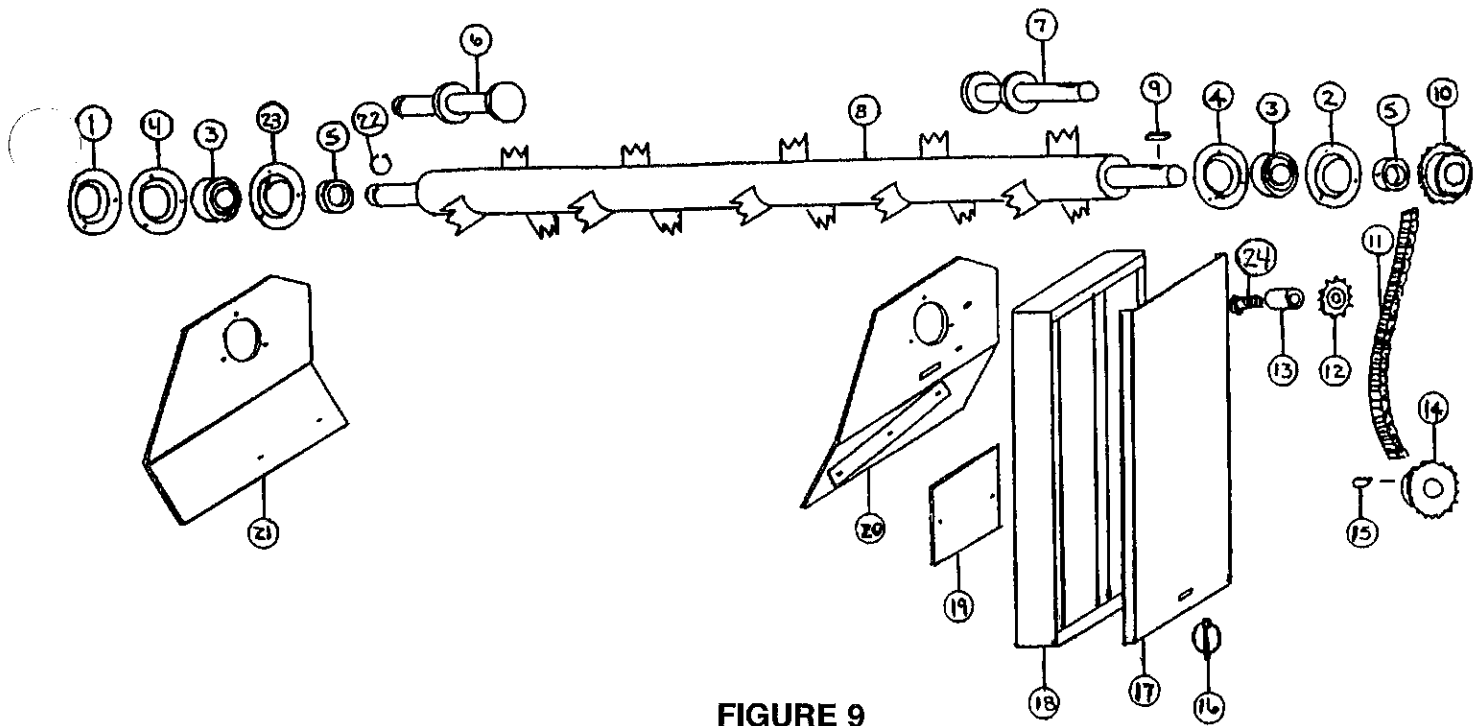


FIGURE 9
H&S MODELS 235 & 270
OPTIONAL 2ND BEATER
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION |
|------|--------|-----|-----------------------------------|
| 1. | 23N308 | " | Bearing Flange Guard |
| 2. | F114A | " | Bearing Flange w/Zerk - 45° |
| 3. | F115 | " | Bearing |
| 4. | F14 | " | Bearing Flange |
| 5. | F16 | " | Lock Collar |
| 6. | 23N164 | " | LH Stub Shaft |
| 7. | 23N165 | " | RH Stub Shaft |
| 8. | 23N166 | " | 2nd Beater |
| 9. | G23 | " | 5/16" x 1-3/8" Square Key |
| 10. | D18 | " | 16T Sprocket |
| 11. | 23N167 | " | #60 Chain (81 Pitches) |
| 12. | 12N42 | " | Idler Sprocket |
| 13. | 23N168 | " | Spacer |
| 14. | F13 | " | 20T Sprocket |
| 15. | 5B9 | " | 3/8" x 1-1/4" Key |
| 16. | F56 | " | Clip Pin |
| 17. | 23N169 | " | Cover |
| 18. | 23N170 | " | Shield |
| 19. | 23N171 | " | Shield |
| 20. | 23N172 | " | RH Panel |
| 21. | 23N173 | " | LH Panel |
| 22. | F73 | " | Snap Ring |
| 23. | F114 | " | Flange w/Straight Zerk |
| 24. | A9 | " | Bolt, 1/2" x 3-1/2" Carriage GR.5 |

NOTE: " (SAME PART NO. AS MODEL 235)

FIGURE 10

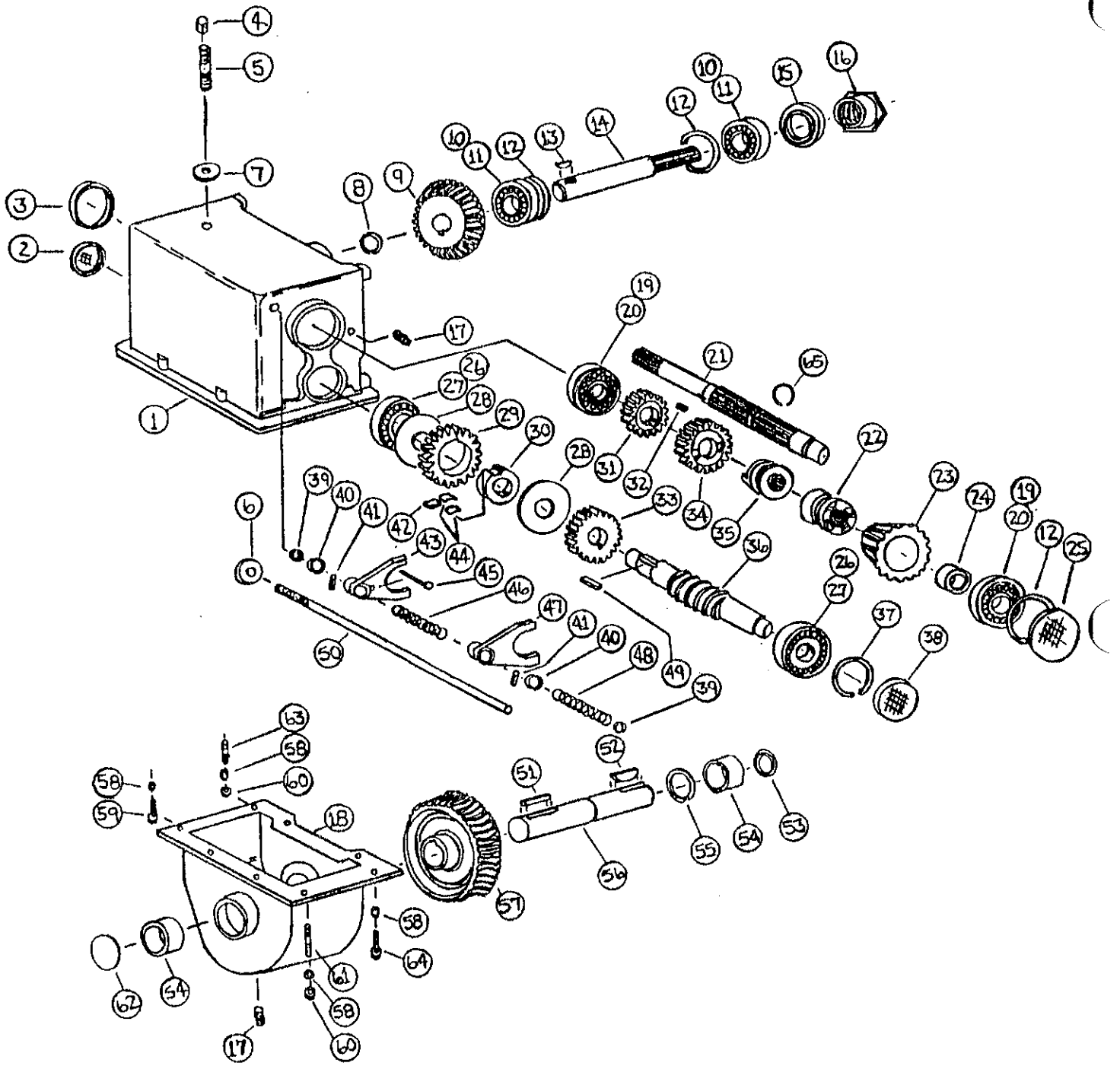


FIGURE 10
H&S MODELS 235 & 270
GEARBOX
SPREADER MODEL & PART NO.

| ITEM | 235 | 270 | DESCRIPTION | ITEM | 235 | 270 | DESCRIPTION |
|------|---------|-----|-------------------------------------|------|---------|-----|------------------------------------|
| 1. | 17G99 | " | Upper Gear Housing | 34. | 17G118 | " | 28T Gear w/Clutch |
| 2. | 17G100 | " | Cap | 35. | 17G119 | " | High Speed Clutch |
| 3. | S136 | " | Seal | 36. | 17G120 | " | Worm Shaft |
| 4. | 17G58 | " | Vent Cap | 37. | 3G19 | " | Retaining Ring |
| 5. | 23N288 | " | Pipe Nipple | 38. | G90 | " | Cap |
| 6. | 17G171 | " | Collar | 39. | 17G121 | " | Seal |
| 7. | 17G61 | " | Washer | 40. | 17G122 | " | Spacer |
| 8. | 12V62 | " | Retaining Ring | 41. | 17G123 | " | 3/16" x 1" Roll Pin |
| 9. | 17G101 | " | 22T Beveled Gear | 42. | 17G124 | " | Clutch Dog |
| 10. | 17G102 | " | Race 13621 | 43. | 17G125 | " | High Speed Shifter Yoke |
| 11. | 17G103 | " | Bearing 13685 | 44. | 17G126 | " | Dog Spring/Low Speed Clutch |
| 12. | G55 | " | Retaining Ring | 45. | 17G127 | " | Stop Bolt 1/4"-20 x 3" Full Thread |
| 13. | G61 | " | 3/8" x 1-1/4" Hardened Woodruff Key | 46. | 17G128 | " | Spring/Beater Engage |
| 14. | 17G104 | " | Beater Output Shaft | 47. | 17G129 | " | Beater Shifter Yoke |
| 15. | 17G105 | " | Seal | 48. | 17G130 | " | Spring/Beater Disengage |
| 16. | 17G106 | " | Adjustment Nut | 49. | S135 | " | 1/4" x 1-1/4" Key |
| 17. | G65 | " | Plug | 50. | 17G131 | " | Shifter Rod |
| 18. | 17G107 | " | Lower Gear Housing | 51. | 17G132 | " | 5/16" x 2-1/4" Key |
| 19. | G54 | " | Race 14276 | 52. | 5B9 | " | 3/8" x 1-1/4" Woodruff Key |
| 20. | G18 | " | Bearing 14124 | 53. | 17G133 | " | Seal |
| 21. | 17G108A | " | Input Shaft | 54. | 17G134 | " | Bushing 1-1/2" ID x 1-1/2" Length |
| 22. | 17G109 | " | Beater Clutch | 55. | 17G135 | " | Retaining Ring |
| 23. | 17G110 | " | 16T Beveled Gear w/Clutch | 56. | 17G136 | " | Worm Gear Output Shaft |
| 24. | 17G111 | " | Bushing 1-1/2" ID x 1" Length | 57. | 17G137 | " | Worm Gear |
| 25. | G68 | " | Cap | 58. | A14 | " | 3/8" Lock Washer |
| 26. | 3G18 | " | Race 15245 | 59. | X111 | " | 3/8" x 1" Bolt GR.5 |
| 27. | L3G24 | " | Bearing 15113 | 60. | K60 | " | 3/8" Nut |
| 28. | 17G112 | " | Washer | 61. | 17G138 | " | 3/8" x 2" Stud |
| 29. | 17G113 | " | 32T Gear w/Clutch | 62. | 17G139 | " | 1-3/4" Cap |
| 30. | 17G114 | " | Gear Hub w/Clutch | 63. | 17G140 | " | 3/8" x 1-1/2" Stud |
| 31. | 17G115 | " | 20T Gear | 64. | 17G141 | " | 3/8"-16 x 1-1/4" Bolt |
| 32. | 17G116 | " | 1/4" x 5/8" Key | 65. | 17G169A | " | Snap Ring |
| 33. | 17G117 | " | 24T Gear | * | 17G142 | " | Complete Gearbox |

NOTE: " (SAME PART NO. AS MODEL 235)

*** (PART IS NOT SHOWN)**

FIGURE 11

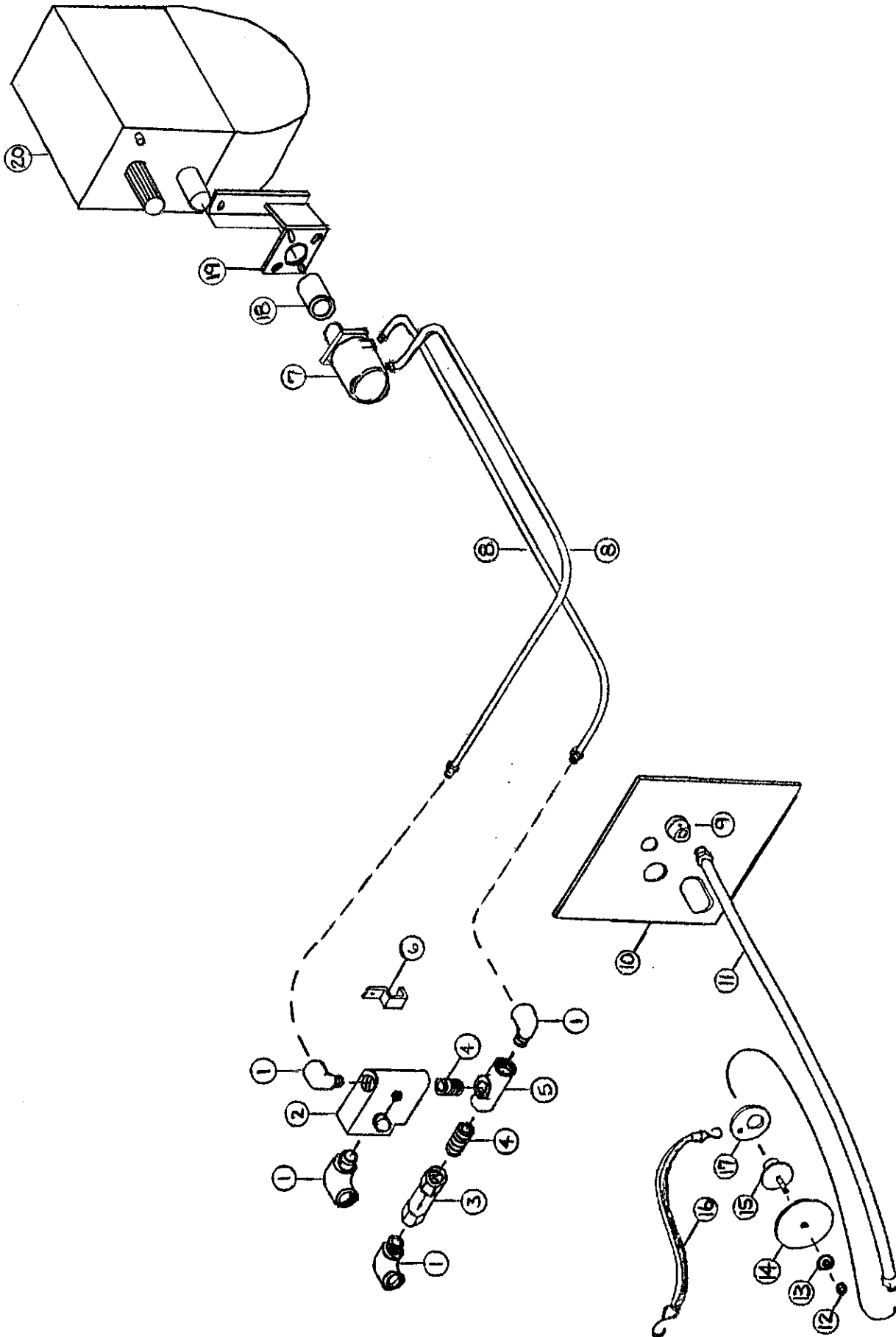


FIGURE 11
H&S MODELS 235 & 270
4 HOSE, 2 SPEED HYDRAULIC DRIVE KIT

| ITEM | 235 | 270 | DESCRIPTION |
|------|--------|-----|------------------------|
| 1. | HE58 | " | 90 Degree Street Elbow |
| 2. | DF15 | " | Speed Control |
| 3. | DF18 | " | Check Valve |
| 4. | DF7 | " | Nipple |
| 5. | DF8 | " | Tee |
| 6. | HE14 | " | Hose Bracket |
| 7. | DF1 | " | Hydraulic Motor |
| 8. | 23N132 | " | Hydraulic Motor Hose |
| 9. | DF21 | " | Reducer |
| 10. | 23N133 | " | Control Panel |
| 11. | DF9 | " | Hose For Handle |
| 12. | K93 | " | 3/8" Lock Nut |
| 13. | DF12 | " | Washer |
| 14. | DF11 | " | Handle |
| 15. | DF10 | " | Handle Bracket |
| 16. | DF14 | " | Strap |
| 17. | DF22 | " | Ring For Strap |
| 18. | 17G161 | " | Coupler |
| 19. | 17G162 | " | Mounting Bracket |
| 20. | 17G163 | " | Complete Gearbox |

NOTE: " (SAME PART NO. AS MODEL 235)
-- (PART IS NOT USED ON THIS MODEL)

FIGURE 12

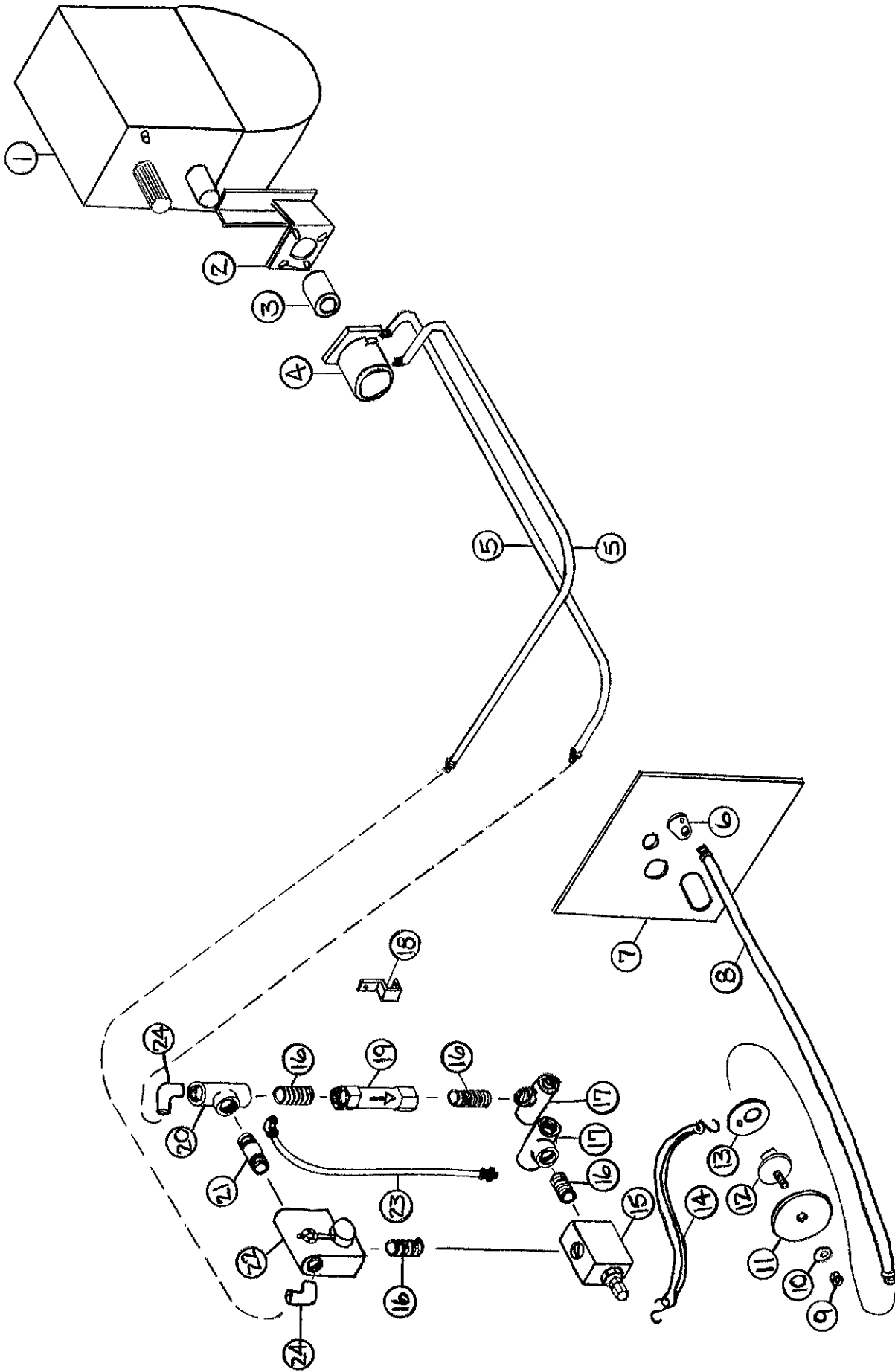


FIGURE 12
H&S MODELS 235 & 270
2 HOSE, 2 SPEED HYDRAULIC DRIVE KIT

| ITEM | PART NO. | DESCRIPTION |
|-------------|-----------------|------------------------|
| 1. | 17G163 | Complete Gearbox |
| 2. | 17G162 | Mounting Bracket |
| 3. | 17G161 | Coupler |
| 4. | DF1 | Hydraulic Motor |
| 5. | 23N132 | Hydraulic Motor Hose |
| 6. | DF21 | Reducer |
| 7. | 23N133 | Control Panel |
| 8. | DF9 | Hose For Handle |
| 9. | K93 | 3/8" Lock Nut |
| 10. | DF12 | Washer |
| 11. | DF11 | Handle |
| 12. | DF10 | Handle Bracket |
| 13. | DF22 | Ring For Strap |
| 14. | DF14 | Strap |
| 15. | DF6 | Sequence Valve |
| 16. | DF7 | Nipple |
| 17. | DF8 | Tee |
| 18. | HE14 | Hose Bracket |
| 19. | DF18 | Check Valve |
| 20. | DF19 | Tee |
| 21. | DF17 | Nipple |
| 22. | DF15 | Speed Control |
| 23. | DF16 | Drain Hose |
| 24. | HE58 | 90 Degree Street Elbow |

FIGURE 13

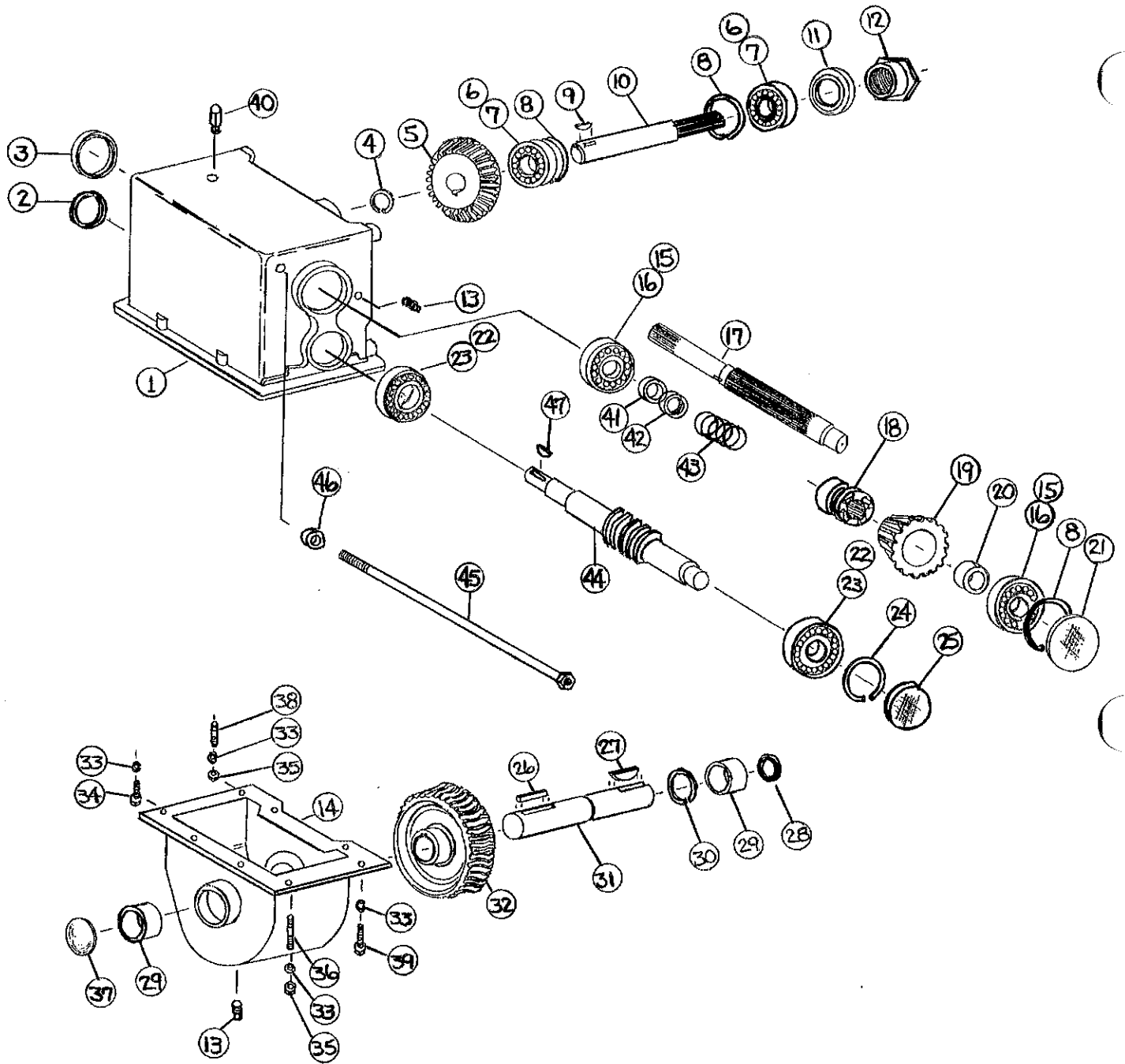


FIGURE 13
H&S MODELS 235 & 270
SPECIAL HYDRAULIC DRIVE, 2 SPEED GEARBOX

| ITEM | 235 | 270 | DESCRIPTION | ITEM | 235 | 270 | DESCRIPTION |
|------|--------|-----|-------------------------------------|------|--------|-----|---------------------------------|
| 1. | 17G99 | " | Upper Gear Housing | 26. | 17G132 | " | 5/16" x 2-1/4 Key |
| 2. | 17G164 | " | Seal | 27. | 5B9 | " | 3/8" x 1-1/4" Woodruff Key |
| 3. | S136 | " | Seal | 28. | 17G133 | " | Seal |
| 4. | 12V62 | " | Retaining Ring | 29. | 17G134 | " | Bushing 1-1/2 ID x 1-1/2 Length |
| 5. | 17G101 | " | 22TBeveled Gear | 30. | 17G135 | " | Retaining Ring |
| 6. | 17G102 | " | Race 13621 | 31. | 17G136 | " | Worm Gear Output Shaft |
| 7. | 17G103 | " | Bearing 13685 | 32. | 17G137 | " | Worm Gear |
| 8. | G55 | " | Retaining Ring | 33. | A14 | " | 3/8" Lock Washer |
| 9. | G61 | " | 3/8" x 1-1/4" Hardened Woodruff Key | 34. | X111 | " | 3/8 x 1 Bolt GR.5 |
| 10. | 17G104 | " | Beater Output Shaft | 35. | K60 | " | 3/8" Nut |
| 11. | 17G105 | " | Seal | 36. | 17G138 | " | 3/8 x 2" Stud |
| 12. | 17G106 | " | Adjustment Nut | 37. | 17G139 | " | 1-3/4" Cap |
| 13. | G65 | " | Plug | 38. | 17G140 | " | 3/8 x 1-1/2 Stud |
| 14. | 17G107 | " | Lower Gear Housing | 39. | 17G141 | " | 3/8-16 x 1-1/4 Bolt |
| 15. | G54 | " | Race 14276 | 40. | G24 | " | Vent Pipe Plug |
| 16. | G18 | " | Bearing 14124 | 41. | 17G165 | " | 5/8" Spacer |
| 17. | 17G108 | " | Input Shaft | 42. | A25 | " | 1" Spacer |
| 18. | 17G109 | " | Beater Clutch | 43. | 23N89 | " | Clutch Spring |
| 19. | 17G110 | " | 16T Beveled Gear w/Clutch | 44. | 17G166 | " | Worm Shaft |
| 20. | 17G111 | " | Bushing 1-1/2" ID x 1" Length | 45. | 17G167 | " | Bolt |
| 21. | G68 | " | Cap | 46. | 17G168 | " | 3/4" Spacer |
| 22. | 3G18 | " | Race 15245 | 47. | 5B10 | " | 1/4 x 1" Key |
| 23. | L3G24 | " | Bearing 15113 | | | | |
| 24. | 3G19 | " | Retaining Ring | | | | |
| 25. | G90 | " | Cap | | | | |

NOTE: " (SAME PART NO. AS MODEL 235)

-- (PART IS NOT SHOWN)

- SERVICE NOTES -

Lined area for service notes.