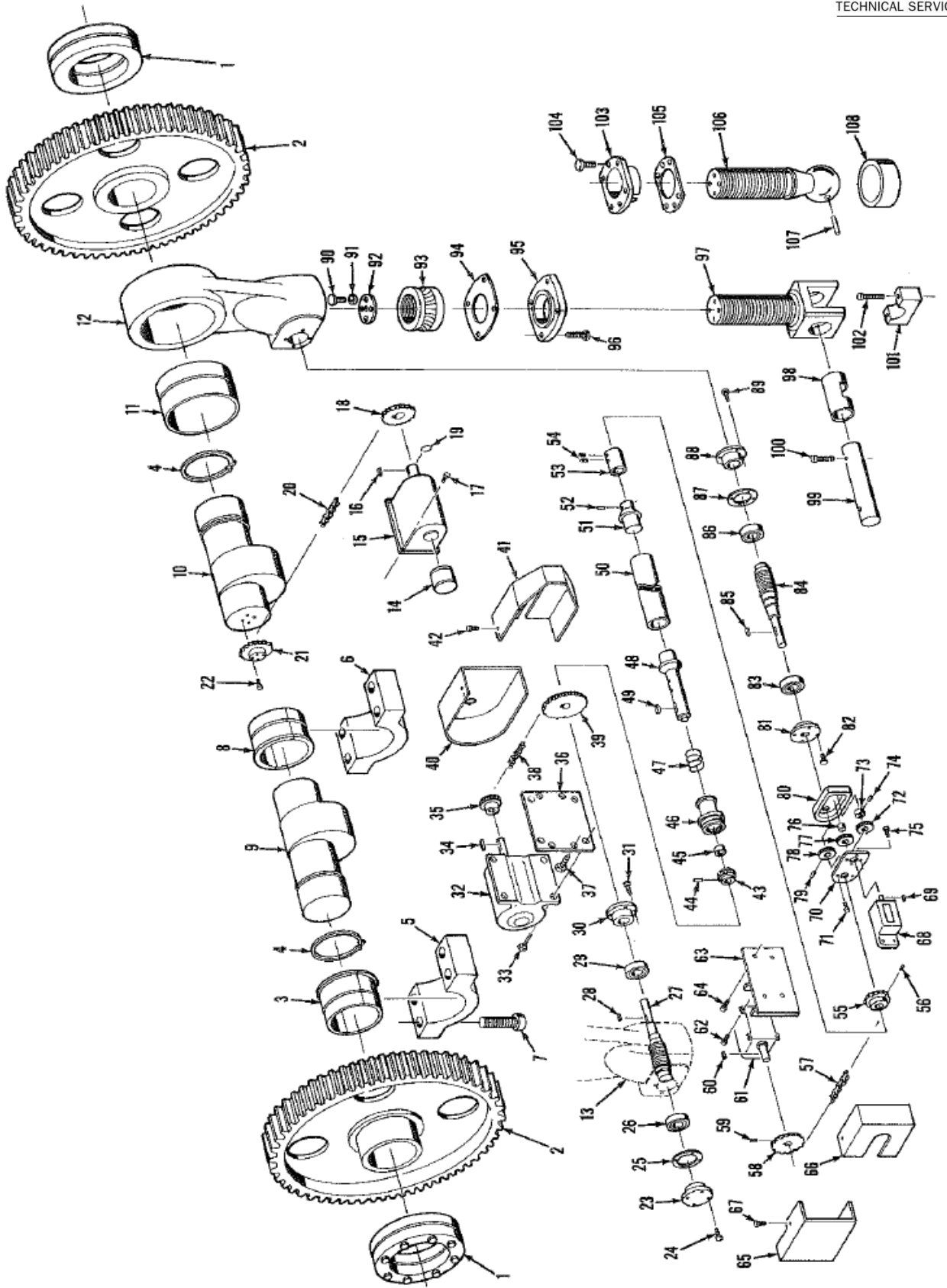


## FRAME & SLIDE

- |   |                                  |
|---|----------------------------------|
| 1. Frame  | 37. Gear Guard Mounting Screw    |
| 2. L.H. Gear Guard Back Plate                   | 38. Belt Guard Back Plate        |
| 3. L.H. Gear Guard Gasket                       | 39. Belt Guard Gasket            |
| 4. L.H. Gear Guard                              | 40. Belt Guard                   |
| 5. Screw  | 41. Belt Guard Mounting Screw    |
| 6. Flywheel Brake Bracket                       | 42. Clutch Guard Mounting Angle  |
| 7. Bracket Mounting Screw                       | 43. Screw                        |
| 8. Flywheel Brake                               | 44. Clutch Guard                 |
| 9. Brake Mounting Screw                         | 45. Control Box                  |
| 10. Slide                                       | 46. Chain Guard                  |
| 11. Slide Liner                                 | 47. Guard Mounting Screw         |
| 12. Liner Mounting Screw                        | 48. Limit Switch Mounting Plate  |
| 13. L.H. Gib Block                              | 49. Plate Mounting Screw         |
| 14. R.H. Gib Block (not shown)                  | 50. Front Gib                    |
| 15. Block Mounting Screw                        | 51. Front Gib Mounting Screw     |
| 16. Washer                                      | 52. Washer                       |
| 17. Gib Adjusting Screw                         | 53. Front Support Block          |
| 18. Hex Nut                                     | 54. Support Block Mounting Screw |
| 19. Gib Lock Screw                              | 55. Gib Lock Screw               |
| 20. Air Counterbalance (see separate part list) | 56. Gib Adjusting Screw          |
| 21. Counterbalance Mounting Screw               | 57. Hex Nut                      |
| 22. Motor                                       | 58. Rear Gib                     |
| 23. Motor Sheave                                | 59. Rear Gib Mounting Screw      |
| 24. Motor Sheave Key                            | 60. Die Block                    |
| 25. Drive Belts                                 | 61. Bolster Plate                |
| 26. Motor Mounting Screw                        | 62. Bolster Screw                |
| 27. Motor Plate                                 | 63. Bolster Washer               |
| 28. Hinge Pin                                   | 64. Bolster Nut                  |
| 29. Snap Ring                                   | 65. Palm Button Bracket          |
| 30. Adjusting Pin                               | 66. Bracket Mounting Screw       |
| 31. Adjusting Screw                             | 67. Knockout Bars*               |
| 32. Roll Pin                                    | 68. Cotter Key*                  |
| 33. Hex Nut                                     | 69. Knockout Pin*                |
| 34. R.H. Gear Guard Back Plate                  | 70. Knockout Support*            |
| 35. R.H. Gear Guard Gasket                      | 71. Lock Screw*                  |
| 36. R.H. Gear Guard                             | 72. Support Screw*               |

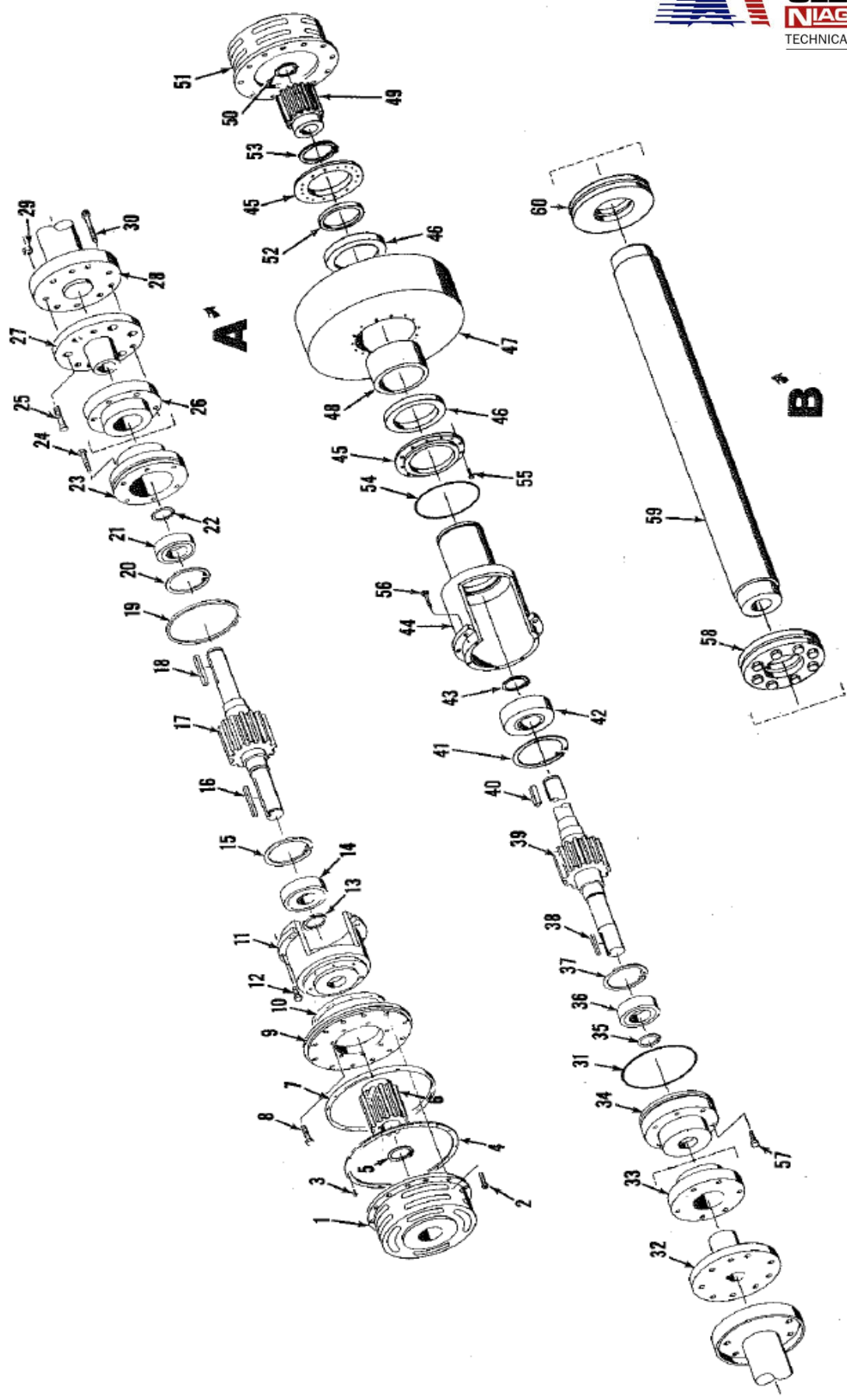
\* Optional



## ECCENTRIC & RAM ADJUSTING SHAFT

- |                                    |  |                                    |
|------------------------------------|--|------------------------------------|
| 1. Shrink Disc                     | 38. Chain                                | 74. Roll Pin                       |
| 2. Main Gear                       | 39. Adjusting Shaft Sprocket             | 75. Indicator Mounting Screws      |
| 3. Outboard Bushing                | 40. Rear Motor Chain Guard               | 76. Idler Shaft                    |
| 4. Snap Ring                       | 41. Front Motor Chain Guard              | 77. Idler Gear                     |
| 5. Outboard Bearing Cap            | 42. Guard Mounting Screw                 | 78. Shaft Gear                     |
| 6. Inboard Bearing Cap             | 43. Coupling Gear                        | 79. Roll Pin                       |
| 7. Bearing Cap Screw               | 44. Roll Pin                             | 80. Gear Box                       |
| 8. Inboard Bushing                 | 45. Bushing                              | 81. R.H. Inboard Bearing Retainer  |
| 9. L.H. Eccentric Shaft            | 46. Coupling Sleeve                      | 82. Retainer Screw                 |
| 10. R.H. Eccentric Shaft           | 47. Spring                               | 83. R.H. Inboard Bearing           |
| 11. Connection Bushing             | 48. L.H. Trunnion                        | 84. R.H. Worm                      |
| 12. R.H. Connection                | 49. Woodruff Key                         | 85. Key                            |
| 13. L.H. Connection                | 50. Adjusting Shaft Connection Tube      | 86. R.H. Outboard Bearing          |
| 14. Stroke Position Indicator      | 51. R.H. Trunnion                        | 87. Shim                           |
| 15. Rotary Limit Switch            | 52. Roll Pin                             | 88. R.H. Outboard Bearing Retainer |
| 16. Key                            | 53. Coupling Sleeve                      | 89. Retainer Screw                 |
| 17. Limit Switch Mounting Screw    | 54. Set Screw                            | 90. Stop Plate Screw               |
| 18. Limit Switch Sprocket          | 55. Shaft Sprocket                       | 91. Lockwasher                     |
| 19. Retaining Ring                 | 56. Set Screw                            | 92. Stop Plate                     |
| 20. Chain                          | 57. Chain                                | 93. Adjusting Nut                  |
| 21. Eccentric Shaft Sprocket       | 58. Limit Switch Sprocket                | 94. Shim                           |
| 22. Sprocket Mounting Screw        | 59. Set Screw                            | 95. Connection Cover               |
| 23. L.H. Outboard Bearing Retainer | 60. Key                                  | 96. Connection Cover Screw         |
| 24. Retainer Screw                 | 61. Limit Switch                         | 97. Connection Screw*              |
| 25. Shim                           | 62. Switch Mounting Screw                | 98. Bushing*                       |
| 26. L.H. Outboard Bearing          | 63. Switch Mounting Bracket              | 99. Wrist Pin*                     |
| 27. L.H. Worm                      | 64. Bracket Mounting Screw               | 100. Wrist Pin Screw*              |
| 28. Key                            | 65. Rear Switch Chain Guard              | 101. Wrist Pin Saddle*             |
| 29. L.H. Inboard Bearing           | 66. Front Switch Chain Guard             | 102. Saddle Screw*                 |
| 30. L.H. Inboard Bearing Retainer  | 67. Guard Mounting Screw                 | 103. Ball Cover*                   |
| 31. Retainer Screw                 | 68. Slide Adjusting Position Indicator   | 104. Cover Screw*                  |
| 32. Motor                          | 69. Key                                  | 105. Shim*                         |
| 33. Motor Mounting Screw           | 70. Gear Box Cover                       | 106. Ball Screw*                   |
| 34. Key                            | (specify L.H. or R.H. Gear Box Mounting) | 107. Dowel*                        |
| 35. Motor Sprocket                 | 71. Cover Screw                          | 108. Ball Seat*                    |
| 36. Motor Mount Bracket            | 72. Indicator Gear                       |                                    |
| 37. Bracket Screw                  | 73. Bushing                              |                                    |

\* When Used

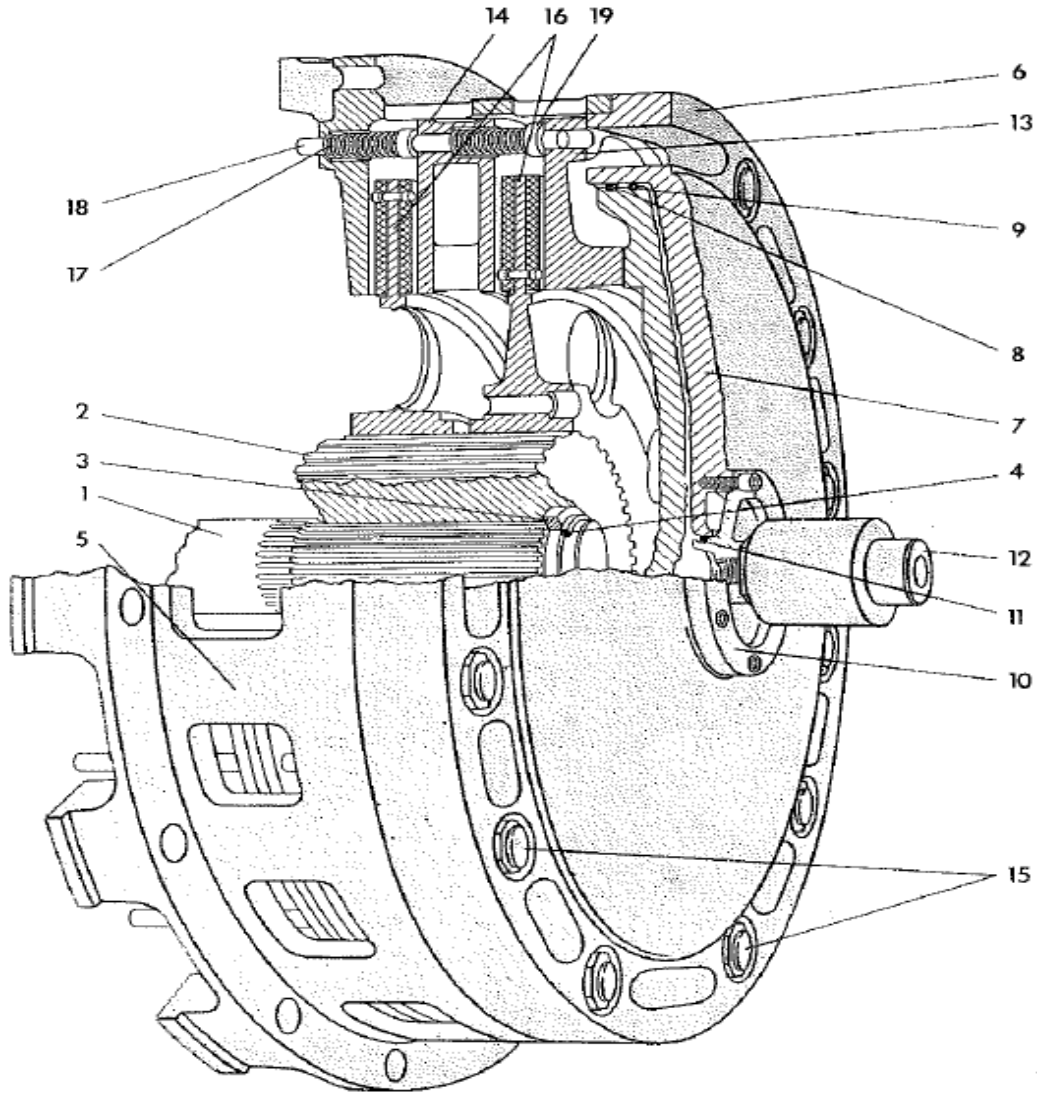


## DRIVE

- |                             |                         |
|-----------------------------|-------------------------|
| 1. Brake                    | 31. 'O' Ring            |
| 2. Capscrew                 | 32. Coupling*           |
| 3. Bolt                     | 33. Taper Lock Adaptor* |
| 4. Brake Adaptor Ring Plate | 34. Bearing Cartridge   |
| 5. Retaining Ring           | 35. Retaining Ring      |
| 6. Brake Hub                | 36. Bearing             |
| 7. Hose Ring Gasket         | 37. Retaining Ring      |
| 8. Bolt                     | 38. Key*                |
| 9. Brake Mounting Plate     | 39. R.H. Drive Shaft    |
| 10. Hose Ring Gasket        | 40. Key                 |
| 11. Bearing Housing         | 41. Retaining Ring      |
| 12. Bolt                    | 42. Bearing             |
| 13. Retaining Ring          | 43. Retaining Ring      |
| 14. Bearing                 | 44. Quill               |
| 15. Retaining Ring          | 45. Bearing Retainer    |
| 16. Key                     | 46. Bearing             |
| 17. L.H. Drive Shaft        | 47. Flywheel            |
| 18. Key*                    | 48. Spacer              |
| 19. 'O' Ring                | 49. Clutch Hub          |
| 20. Retaining Ring          | 50. Retaining Ring      |
| 21. Bearing                 | 51. Clutch              |
| 22. Retaining Ring          | 52. Spacer              |
| 23. Bearing Cartridge       | 53. Retaining Ring      |
| 24. Bolt                    | 54. Hose Ring Gasket    |
| 25. Drive Bolt*             | 55. Bolt                |
| 26. Taperlock Adaptor*      | 56. Bolt                |
| 27. Coupling                | 57. Bolt                |
| 28. Middle Driveshaft*      | 58. Shrink Disc*        |
| 29. Nut*                    | 59. Center Driveshaft*  |
| 30. Capscrew*               | 60. Shrink Disc*        |

\* When used in either Arrangement "A" or "B"

# AIR FRICTION CLUTCH - Type LI-P



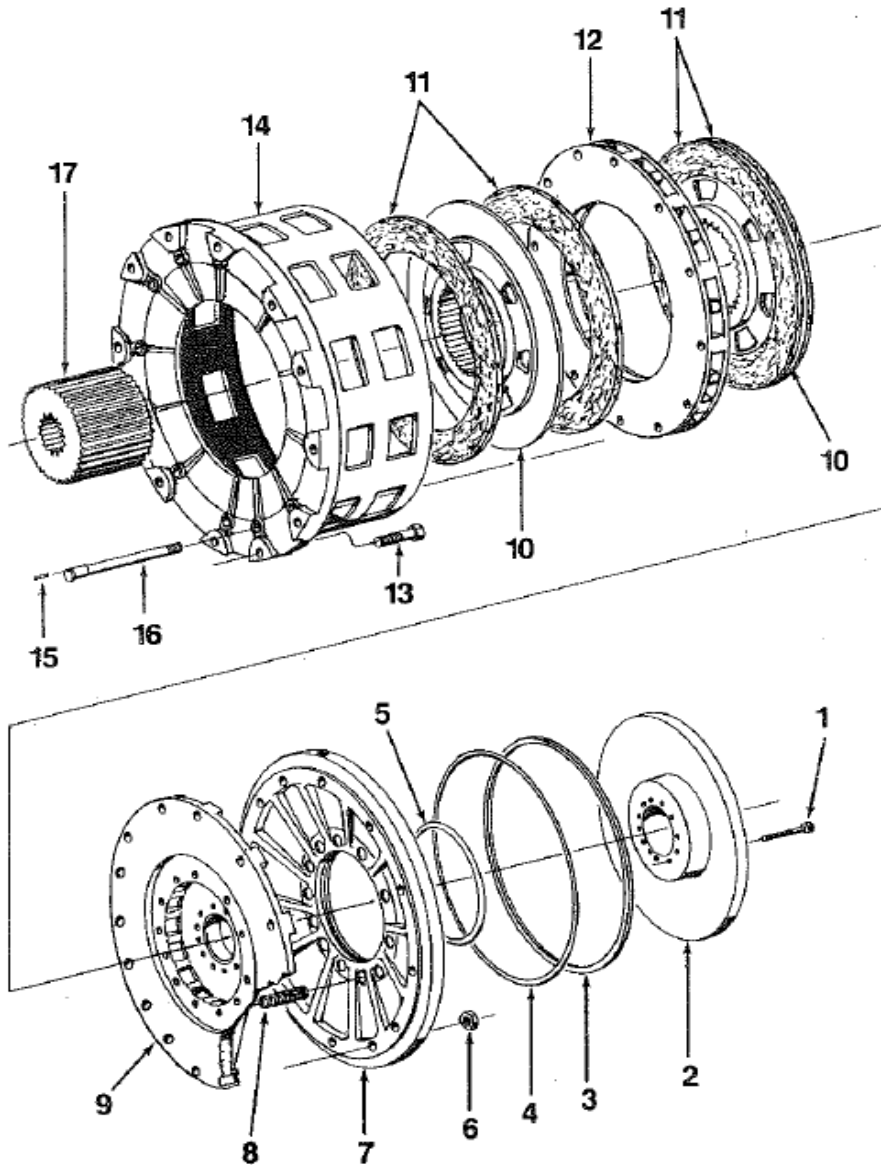
- 1. Drive Shaft
- 2. Driving Hub
- 3. Key
- 4. Retainer Ring
- 5. Clutch Housing
- 6. Clutch Cylinder
- 7. Clutch Piston
- 8. Piston Wiper
- 9. Piston "O" Ring
- 10. Rotary Air Seal Adapter

- 11. Adapter "O" Ring
- 12. Rotary Air Seal
- 13. Pressure Plate
- 14. Inner Pressure Plate
- \*15. Pressure Plate Guides & Nut
- 16. Friction Disc
- 17. Spreader Spring
- 18. Spring Guide
- 19. Guide Collar

\* Refer to Table for recommended torque value.

TORQUE VALUES BY FRICTION DISC DIAMETER	
8"	25-30 ft/lbs
10"	30-35 ft/lbs
11"	35-40 ft/lbs
13"	45-50 ft/lbs
17"	70-80 ft/lbs
18"	70-80 ft/lbs
21"	90-100 ft/lbs
25"	110-120 ft/lbs
30"	190-200 ft/lbs
35"	220-230 ft/lbs

# AIR RELEASING DISC BRAKE



1. Piston Screw (Remove to replace seal and rings.)
2. Piston
3. Piston Dust Seal
4. Piston Ring (outer)
5. Piston Ring (inner)
- \*6. Cylinder Stud Nut (Remove to replace linings.)
7. Cylinder
8. Spring
9. Pressure Plate

10. Brake Disc (quantity may vary)
11. Brake Lining (quantity may vary)
12. Center Plate (not used with single disc)
13. Brake Ring Mounting Screw
14. Brake Ring
15. Brake Stud Pin
16. Brake Stud
17. Brake Hub
18. Lining Rivet (not shown)

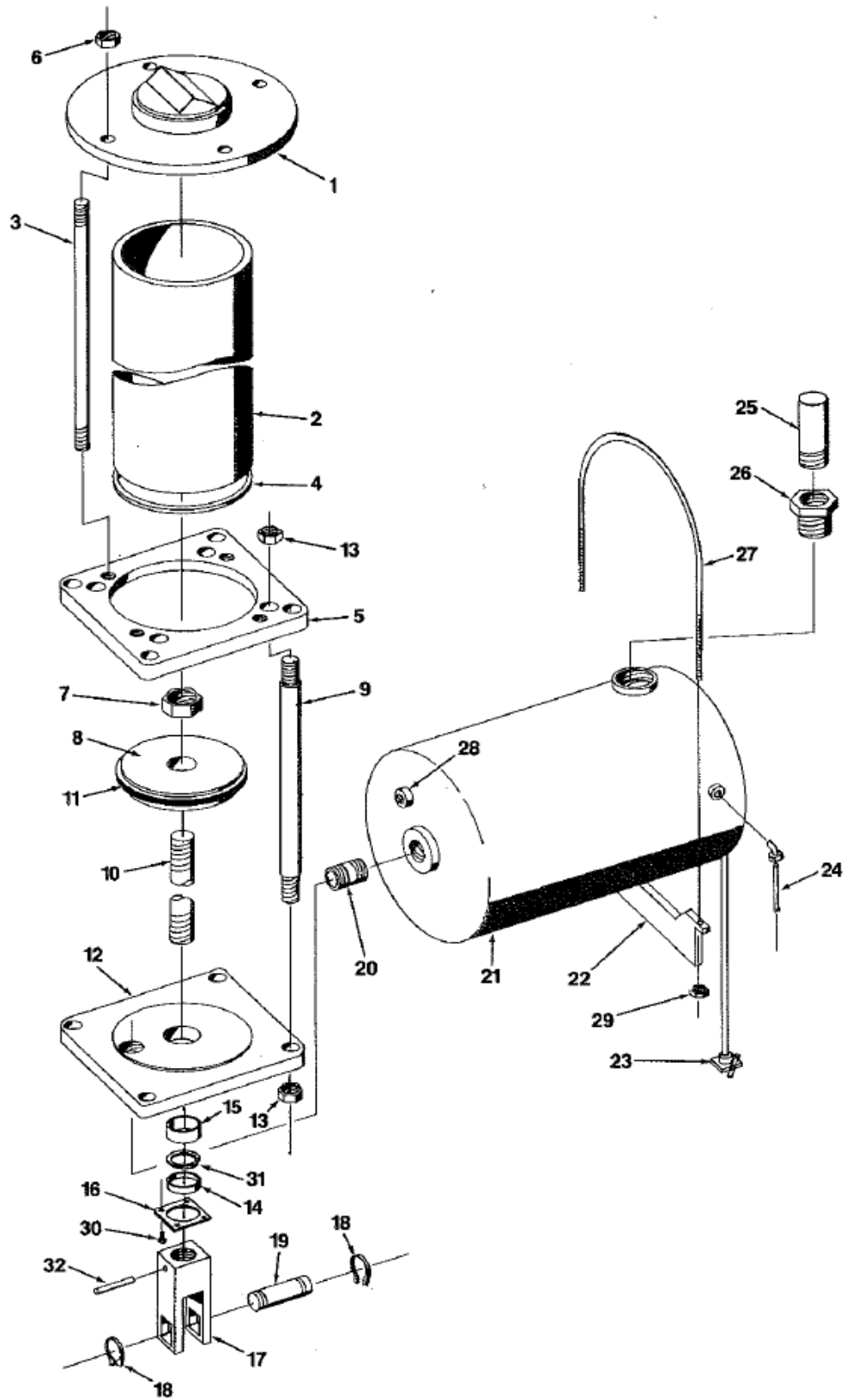
\* Refer to Table for recommended torque value.

TORQUE VALUES BY FRICTION DISC DIAMETER	
8"	25-30 ft/lbs
10"	30-35 ft/lbs
11"	35-40 ft/lbs
13"	45-50 ft/lbs
17"	70-80 ft/lbs
18"	70-80 ft/lbs
21"	90-100 ft/lbs
25"	110-120 ft/lbs
30"	190-200 ft/lbs
35"	220-230 ft/lbs

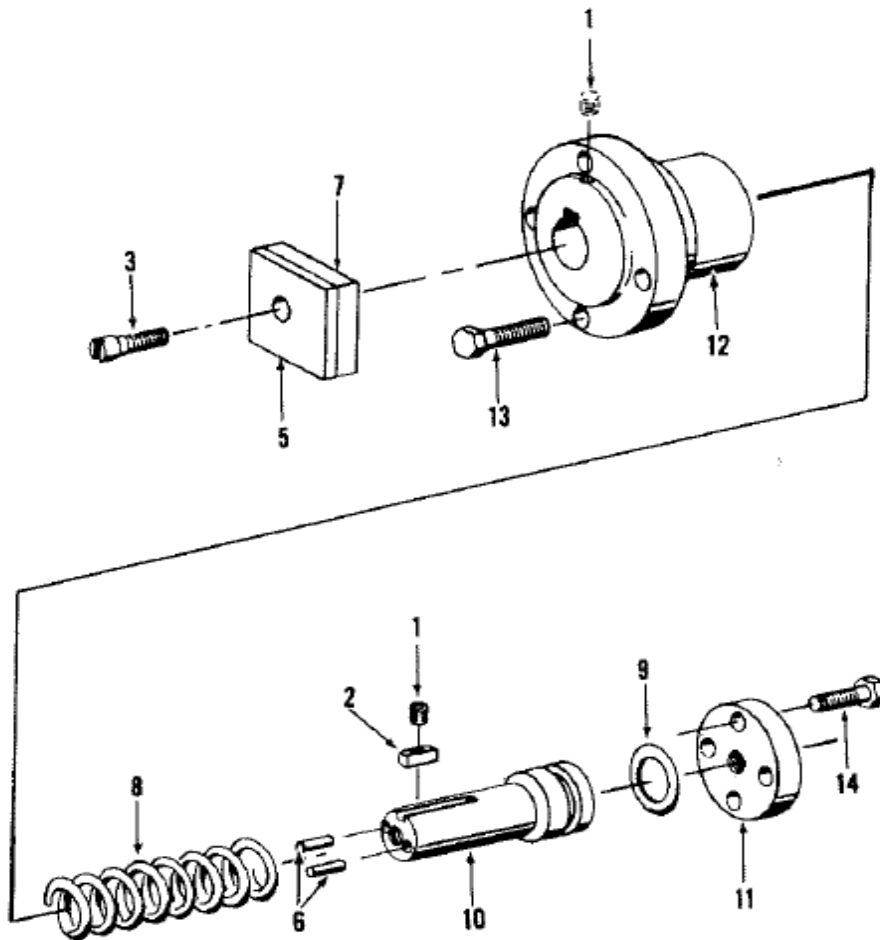
# AIR COUNTERBALANCE and TANK



1. Cylinder Cap
2. Cylinder
3. Stud
4. Seal
5. Mounting Plate
6. Stud Nut
7. Piston Rod Nut
8. Piston
9. Tie Rod
10. Piston Rod
11. Piston Seal
12. Lower Cylinder Cover
13. Tie Rod Nut
14. Seal
15. Bushing
16. Retaining Plate
17. Clevis
18. Retaining Ring
19. Clevis Pin
20. Piping
21. Air Tank
22. Tank Bracket
23. Petcock
24. Air Line
25. Safety Valve
26. Bushing
27. Tank Rod
28. Fusible Plug
29. Tank Rod Nut
30. Retaining Plate Screws
31. Retaining Ring
32. Roll Pin



# AIR OPERATED FLYWHEEL BRAKE



- |                   |                             |
|-------------------|-----------------------------|
| 1. Key Dowel Pin  | 9. "O" Ring                 |
| 2. Guide Key      | 10. Piston                  |
| 3. Mounting Screw | 11. Cylinder Cover          |
| 5. Brake Lining   | 12. Cylinder                |
| 6. Dowel Pin      | 13. Cylinder Mounting Screw |
| 7. Brake Shoe     | 14. Cover Mounting Screw    |
| 8. Spring         |                             |