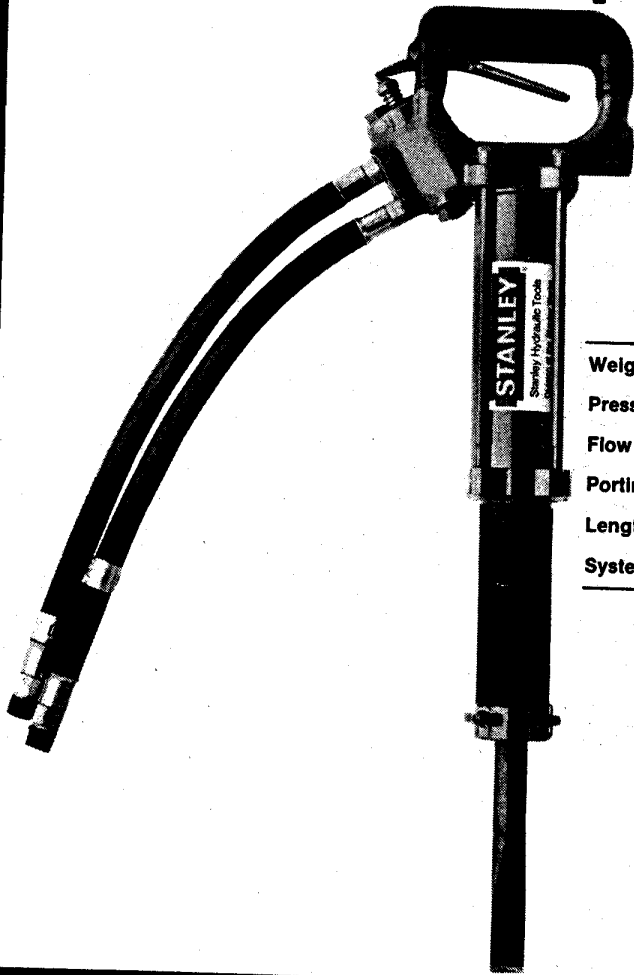


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Stanley Hydraulic Tools
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PARTS LIST



CH18

SPECIFICATIONS

Weight	24 lbs/10.9 kg
Pressure Range	1500-2000 psi/105-140 bar
Flow Range	7-9 gpm/26-34 lpm
Porting	3/8 male pipe hose end
Length	20 in./50.8 cm
System Type	o.c. or c.c.

MODEL CH18

**HYDRAULIC
CHIPPING
HAMMER**

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SERVICE INSTRUCTIONS CH18 CHIPPING HAMMER

TO REMOVE THE WIRE RETAINER.

1. Locate the end of the wire retainer which is not swaged, and with a drive pin, drive this end of the wire retainer through and out of the hole in the retaining nose assembly.
2. Rotate the wire retainer about the end still engaged in the retaining nose assembly to 90° off the end of the retaining nose assembly. The wire retainer will now pull free of the retaining nose assembly.

TO INSTALL THE WIRE RETAINER.

1. The wire retainer is installed on the side of the retaining nose assembly where the two holes for the wire retainer are closest together. With the wire retainer rotated 90° to its assembled position, insert the swaged end of the wire retainer into the oblong hole in the retaining nose assembly.
2. Rotate the wire retainer towards its assembled position and force the free end into the second hole in the retaining nose assembly. The wire retainer can now be pushed into place.

TO REMOVE THE SLIDE RETAINER.

1. Loosen and remove the two capscrews from the retaining nose assembly.

Note: The two spring and ball detents will push the retainer and retainer cap away as the capscrews are loosened. The springs will be unloaded before the capscrews are fully out of the threads.

2. The balls will fall free as soon as the retainer and retainer cap are lifted away from the retaining nose.

TO ASSEMBLE THE SLIDE RETAINER.

1. With the retainer nose held vertically, install the springs into the spring holes in the retainer nose.

2. Place the balls on the ends of the springs. Position the retainer on the ball-and-spring detents with the detent impressions of the retainer set on the balls.
3. Place the retainer cap on the retainer, hold these parts in position and install the capscrews and lockwashers. Use a thread locking adhesive such as Loctite #242 on the capscrew threads. Tighten the capscrews to 25-30 ft.-lb.

Note: To replace the on-off valve spool seals, the on-off valve spool must be removed from the handle body assembly.

TO REMOVE THE ON-OFF VALVE SPOOL.

1. Drive out the dowel pin and remove trigger.
2. Remove retaining ring and pull the on-off valve spool out of its bore.
3. Remove the two seals from the grooves in the handle body assembly and install the new seals. (If quad ring seals are installed, they will seem too big for the groove until all the ring is worked into the groove. Lubricating the quad ring eases the installation.)
4. When replacing the on-off valve spool, carefully push the spool with a twisting motion through the bore and seals so as not to cut the new seals. Lubrication is necessary so that the seals can easily pass over the spool grooves.
5. Install the retaining ring in its groove.
6. Put the trigger in place, then drive the dowel pin through the trigger to slightly below the handle surface on both sides of the handle body assembly. Stake the aluminum handle material around the dowel pin to retain it.

TO DISASSEMBLE THE TOOL.

1. Hold the chipper horizontally in a vise by the retaining nose assembly bolt flange. Remove the four bolt assemblies.

2. While pulling the handle body assembly, assist the removal by driving the assembly with a soft faced mallet. Remove pin.
3. The valve body, oil tube and piston can be removed by putting a half-inch rod through the retaining nose assembly and driving the parts out with a hammer, being careful to ease the parts out at the last so as not to drop and damage the parts.

Note: Holding the chipper by the flow sleeve assembly will close the internal clearances and make removal of the piston difficult.

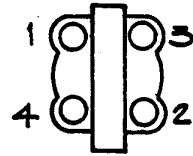
4. To remove the retaining nose assembly from the flow sleeve assembly, clamp the flow sleeve assembly in a vise just tight enough to hold the flow sleeve assembly while driving the retaining nose assembly off with a soft faced mallet. Hammer against the bolt flange while pulling and guiding the retaining nose assembly.
5. The valve gland is removed from the valve body by pushing the reversing spool against the valve gland through the valve body.
6. Inspect all parts for excessive wear.

TO REASSEMBLE THE CHIPPING HAMMER.

Note: Lubricate all seals before installing them. Install the rod seal with the sealing lips up.

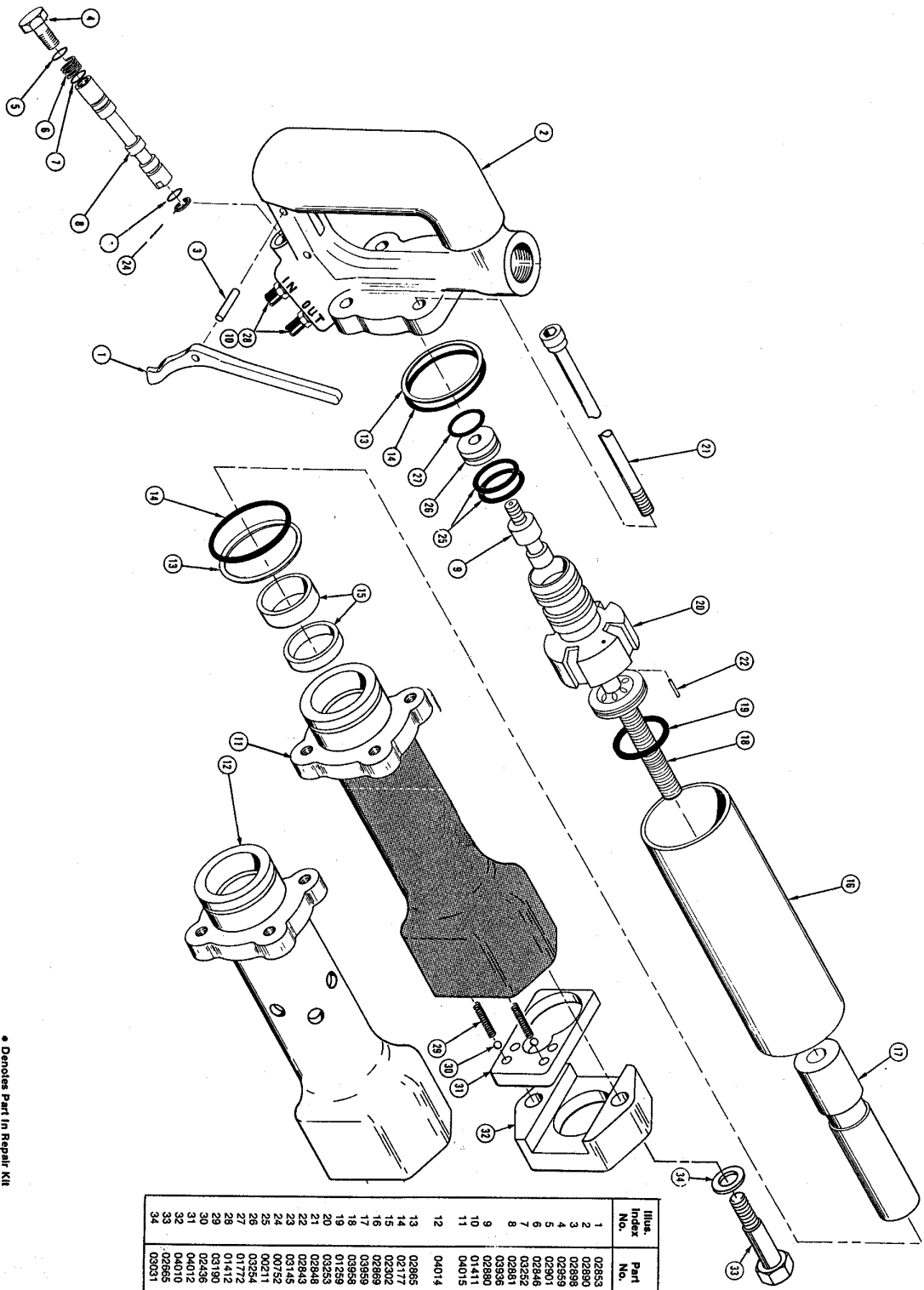
1. With the retaining nose assembly oriented with the retainer horizontal, align the flow sleeve assembly with the hole in the flow sleeve for the pin to the upper right and push the flow sleeve assembly onto the retaining nose assembly.

2. Place the piston into the flow sleeve, followed by the oil tube which is pushed into the counterbore in the end of the flow sleeve.
3. Reassemble the valve body, reversing spool and valve gland. Check for free spool movement.
4. Using the pin in the flow sleeve for alignment, push the valve body into flow sleeve assembly. Push the valve body to seat against the flow sleeve. Carefully push the handle body assembly onto the valve body and into the flow sleeve assembly making certain the pin enters the alignment hole in the handle body assembly. Pull the whole assembly together with the four bolt assemblies. Tighten the bolt assemblies to 20 ft.-lbs. torque in increments of 5 ft.-lbs. using the sequence illustrated below.



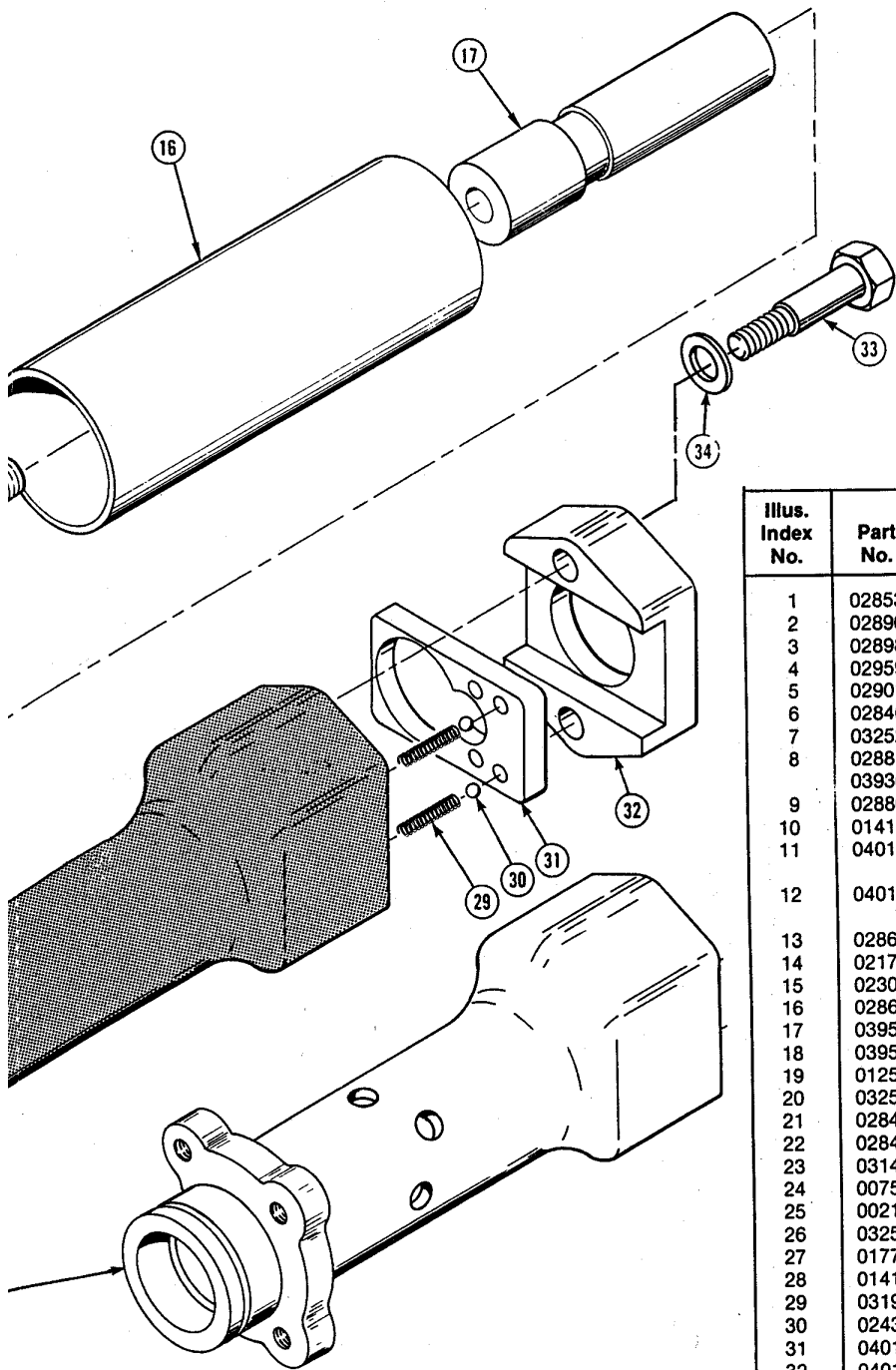
ADDITIONAL NOTES.

1. Obtain seal kit part no. 03331 for land models or seal kit part no. 03843 for underwater models so all seals exposed may be replaced. Note orientation of seals before removing them. Install new seals in the same way.
2. If the chipper is to be repainted after service, be sure to mask off the exposed end of the valve spool and its spring. Do not allow paint to enter "in" and "out" ports or the bore of the retaining nose.



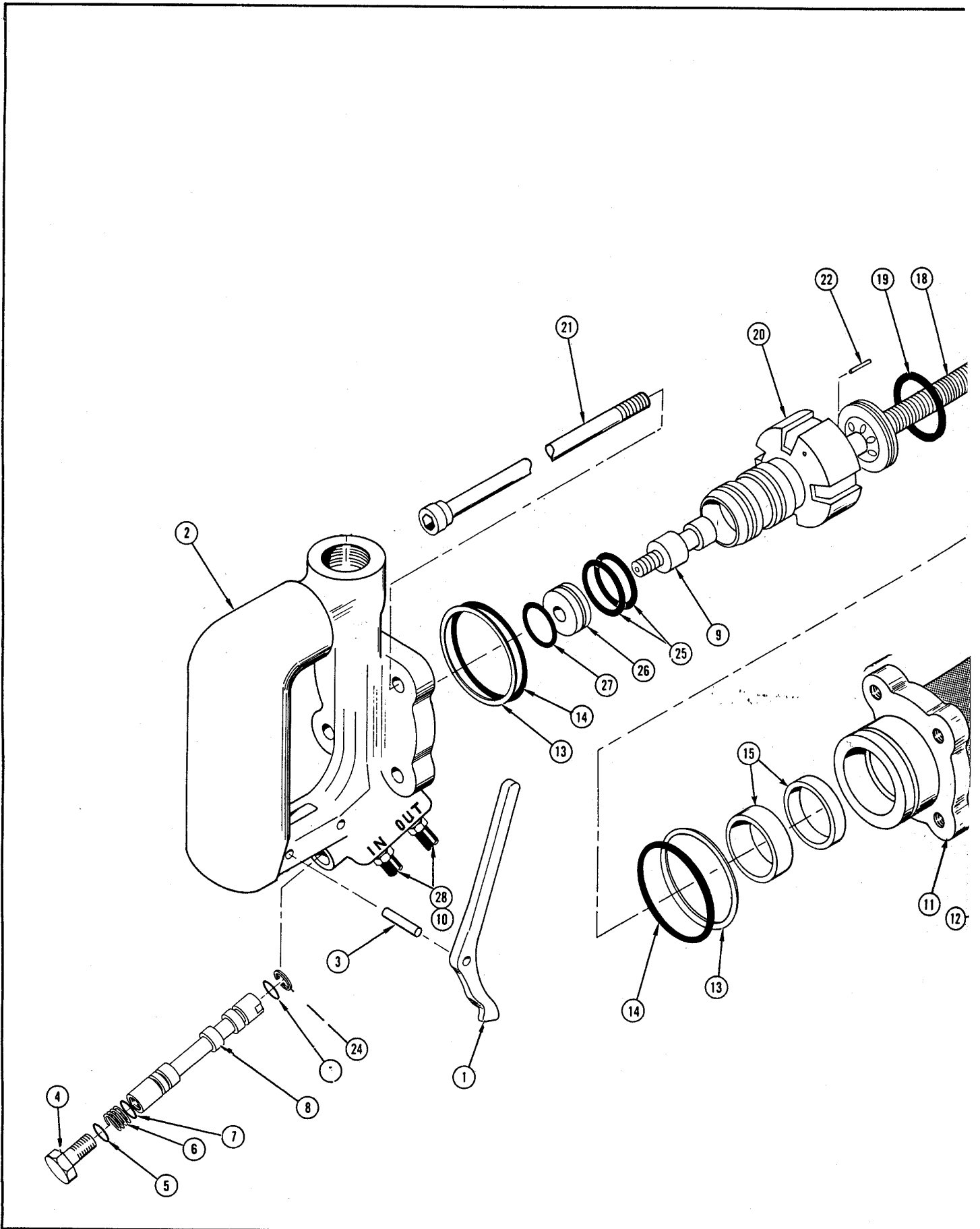
Illus. Index No.	Part No.	Qty. Per Unit	Part Name
1	02853	1	Trigger
2	02850	1	Handle Body Assembly
3	02859	1	Dowel Pin, 3/16 x 1-1/2
4	02901	1	Spool Screw
5	02901	1	Spring, .528 x .367 x .084 (90 Duro)Ⓞ
6	02846	1	O-Ring, 7/16 x 5/16 x 1/16Ⓞ
7	02852	2	O-Ring, 7/16 x 5/16 x 1/16Ⓞ
8	02881	1	On-Off Valve Spool o.c.
9	02890	1	Reversing Spool
10	01411	1	O-Ring, .463 x .624 x .078 Ⓞ
11	04015	2	Retaining Nose Assy. (Land) (incl. items 29 thru 34)
12	04014	1	Retaining Nose Assy. (U/W) (incl. items 29 thru 34)
13	02865	2	Pin
14	02177	2	Rod Seal, 1-1/4 x 1-5/8 x 5/16 x 3/16Ⓞ
15	02302	1	Flow Sleeve Assembly
16	02869	1	Piston
17	03958	1	Oil Tube
18	03958	1	O-Ring, 1-1/2 x 1-5/8 x 1/16Ⓞ
19	01259	1	Valve Body
20	02848	1	Bolt Assembly •
21	02848	4	Pin •
22	02848	1	Pin •
23	02848	1	Pin •
24	00732	1	Retainer •
25	00211	2	Valve Gland
26	03254	1	O-Ring, 1 x 1-1/8 x 1/16Ⓞ
27	01772	1	O-Ring, 3/4 x 7/8 x 1/16 (90 Duro)Ⓞ
28	01412	2	Hose Assembly (incl. item 10)
29	03190	2	Spring
30	02436	2	Steel Ball
31	04012	1	Retainer
32	04010	1	Retaining Cap
33	02855	2	Cap Screw
34	03051	2	Lockwasher

• Denotes Part In Repair Kit
 Ⓞ Denotes Part In Seal Kit



Illus. Index No.	Part No.	Qty. Per Unit	Part Name
1	02853	1	Trigger
2	02890	1	Handle Body Assembly
3	02898	1	Dowel Pin, 3/16 x 1-1/2
4	02959	1	Spool Screw
5	02901	1	O-Ring, .239 x .367 x .064 (90 Duro)⊙
6	02846	1	Spring
7	03252	2	O-Ring, 7/16 x 9/16 x 1/16 ⊙
8	02881	1	On-Off Valve Spool o.c.
	03936	1	On-Off Valve Spool c.c.
9	02880	1	Reversing Spool
10	01411	2	O-Ring, .468 x .624 x .078 ⊙
11	04015	1	Retaining Nose Assy. (Land) (incl. items 29 thru 34)
12	04014	1	Retaining Nose Assy. (U/W) (incl. items 29 thru 34)
13	02865	2	Back-Up Ring ⊙
14	02177	2	O-Ring, 2-1/16 x 2-1/4 x 3/32 (90 Duro)⊙
15	02302	2	Rod Seal, 1-1/4 x 1-5/8 x 5/16 x 3/16 ⊙
16	02869	1	Flow Sleeve Assembly
17	03959	1	Piston
18	03958	1	Oil Tube
19	01259	1	O-Ring, 1-1/2 x 1-5/8 x 1/16 ⊙
20	03253	1	Valve Body
21	02848	4	Bolt Assembly ●
22	02843	1	Pin ●
23	03145	1	Name Tag (Not Illus.)
24	00752	1	Retaining Ring, 7/16 Ext. ●
25	00211	2	O-Ring, 1 x 1-1/8 x 1/16 ⊙
26	03254	1	Valve Gland
27	01772	1	O-Ring, 3/4 x 7/8 x 1/16 (90 Duro)⊙
28	01412	2	Hose Assembly (incl. item 10)
29	03190	2	Spring
30	02436	2	Steel Ball
31	04012	1	Retainer
32	04010	1	Retaining Cap
33	02665	2	Capscrew
34	03031	2	Lockwasher

● Denotes Part In Repair Kit
 ⊙ Denotes Part In Seal Kit



Part No.	Qty.	Description
UNDERWATER MODEL		
Repair Kit Part No. 03844		
00752	1	Retaining Ring
02848	2	Bolt Assembly
02843	1	Pin
03116	1	Wire Retainer
03254	1	Valve Gland
Seal Kit Part No. 03843		
02907	2	Rod Seal
03252	2	O-Ring
02901	1	O-Ring
02865	2	Back-Up Ring
02177	2	O-Ring
03127	1	Wiper Ring
02302	1	Seal
01259	1	O-Ring
01772	1	O-Ring
00211	2	O-Ring

NOTE: Seal Kit Included In Repair Kit

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