

ABDT SERVICE PORTION, PART NO. 593037

NOTE: The Service Portion, Part No. 593037 is no longer available as a complete device. This catalog is issued as a convenience for ordering repair parts only.

APRIL, 2003

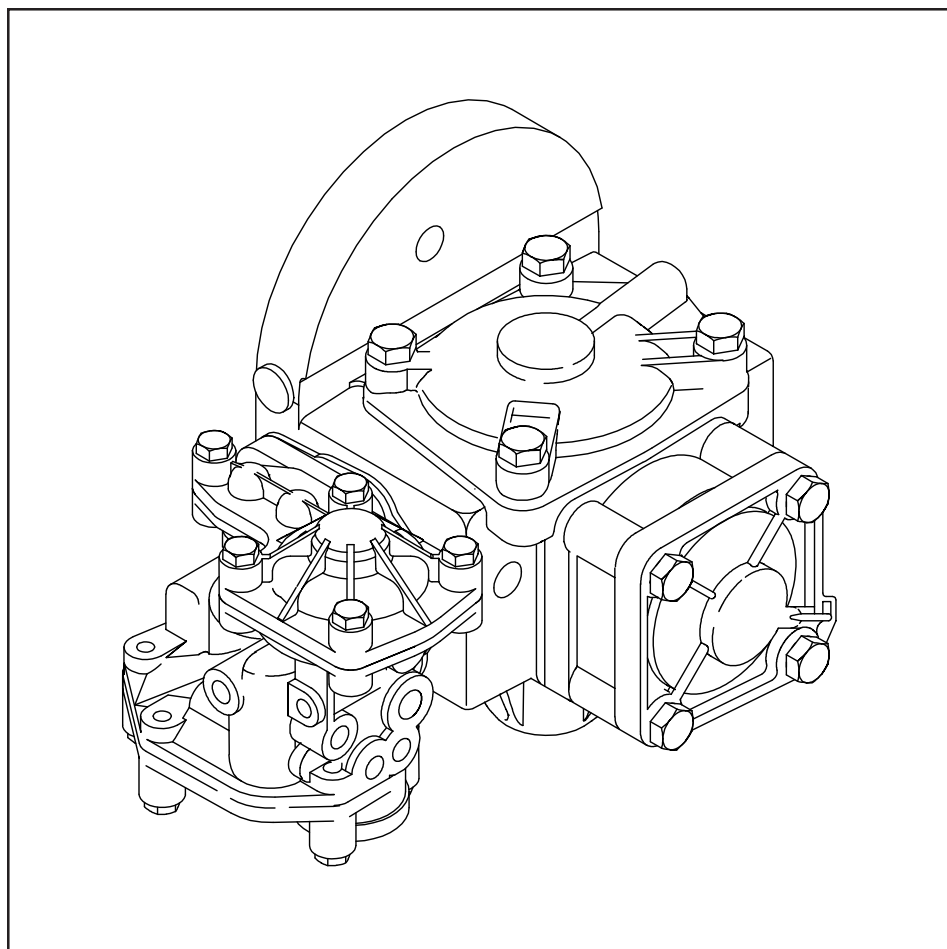
Supersedes issue dated April, 1997

IMPORTANT: This catalog is published as an aid in identifying the detail parts that make up this complete device. Refer to applicable maintenance publication **BEFORE** attempting either the disassembly or the assembly of this device.

⚠ WARNING: At the time any part is replaced in this device, the operation of the complete device must pass a series of tests prescribed in the latest issue of the applicable Wabtec Test Specification. At the time this device is applied to the brake equipment arrangement, a stationary vehicle test must be made to ensure that this device functions properly in the total brake equipment arrangement. (Consult your local Wabtec Representative for identity of the test specification, with latest revision date, that covers this device.)

IMPORTANT: Only Wabtec supplied parts are to be used in the repair of this device in order to obtain satisfactory operation. Commercially available non-O.E.M. parts are unacceptable.

NOTE: The part numbers and their associated descriptions are the property of Wabtec Corporation and may not be replicated in any manner or form without the prior sole written consent of an Officer of Wabtec Corporation.



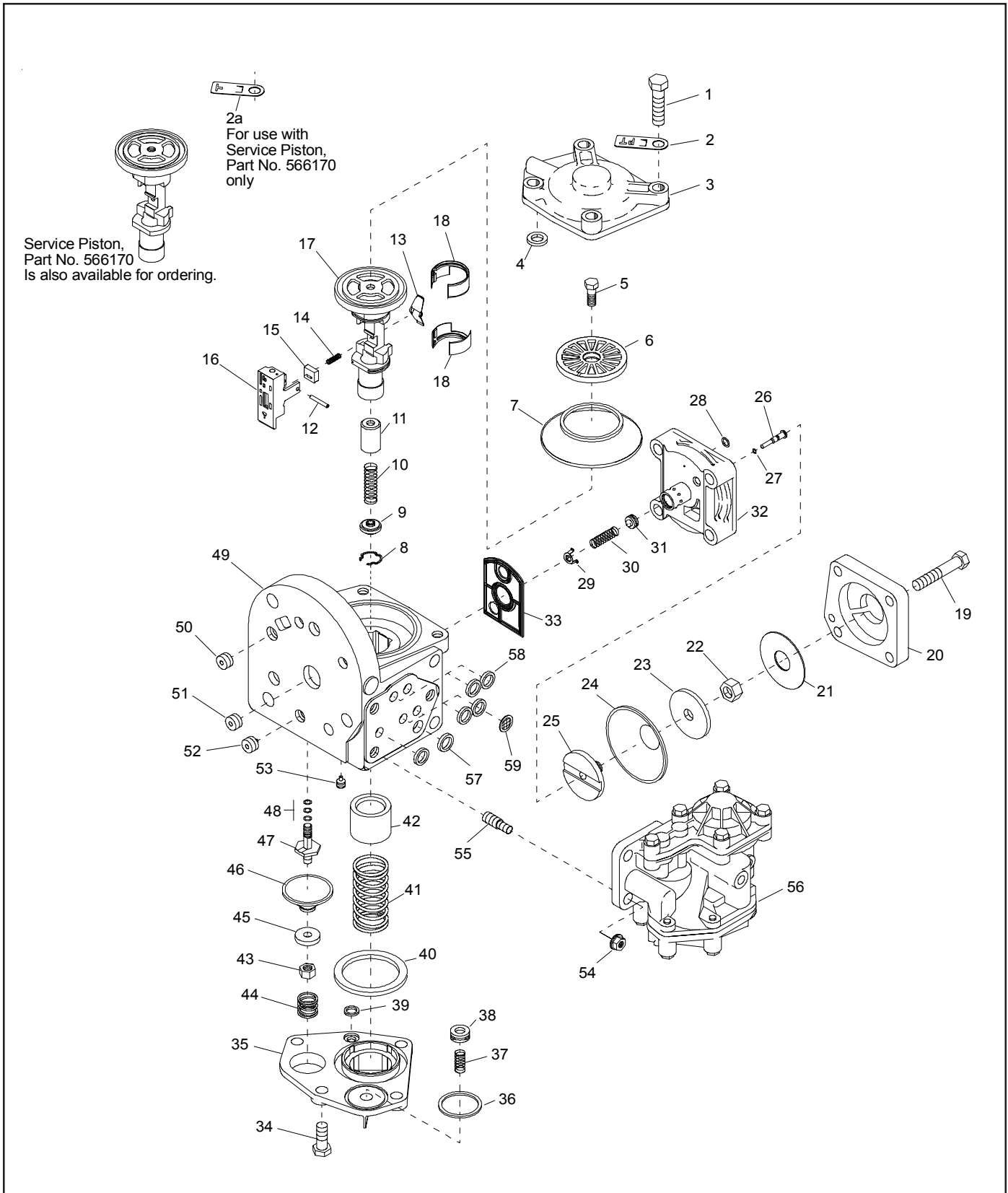


Figure 1 - Part No. 593037



Parts Catalog

ABDT SERVICE PORTION, PART No. 593037 - Figure 1

Figure & Ref. No.	Customer Part No.	Wabtec Part No.	Description	Qty.
1 -		593037	ABDT SERVICE PORTION (Includes ALL items of Figures 1 and 2)	Ref.
1 -		593039	..ABD SERVICE PORTION , less Release Valve Portion (Includes Ref. Nos. 1, and 3 to 55)	Ref.
1 - 1		542640	..BOLT , $\frac{1}{2}$ -13 x $1\frac{3}{4}$ " Hex	4
1 - 2		660697	..TAG , Metal Identification	1
1 - 2a		305091	..TAG , Metal Identification	1
1 - 3		566177	..COVER , Top	1
1 - 4		• 99458	..GASKET , $\frac{1}{4}$ " Flange Fitting Ring	1
1 - 5		564568	..BOLT , $\frac{5}{8}$ -11 x 1" Hex	1
1 - 6		566467	..FOLLOWER , Diaphragm	1
1 - 7		• 565048	..DIAPHRAGM , Service Piston	1
1 - 8		525022	..RETAINER , Spring	1
1 - 9		563921	..SEAT , Spring	1
1 - 10		563920	..SPRING , Piston (See Page 8 for Spring Identification Chart)	1
1 - 11		563919	..GUIDE , Piston Spring	1
1 - 12		563930	..PIN , $\frac{3}{32}$ x 1" Cylindrical Spring	1
1 - 13		93946	..SPRING , Slide Valve	1
1 - 14		93940	..SPRING , Graduating Valve (See Page 8 for Spring Identification Chart)	1
1 - 15		660499	..VALVE , Graduating	1
1 - 16		566175	..VALVE , Slide	1
1 - 17		□ 660672	..PISTON , Service Complete (Includes Ref. No. 18) See Note, Page 4	1
1 - 18		660890	...RING , Service Piston	2
1 - 19		562645	..BOLT , $\frac{1}{2}$ -13 x $2\frac{3}{4}$ " Hex	4
1 - 20		566196	..COVER , Service Accelerated Release Valve	1
1 - 21		660666	..DISK , Wear Protection	1
1 - 22		526489	..NUT , $\frac{9}{16}$ " Hex	1
1 - 23		566193	..FOLLOWER , Diaphragm	1
1 - 24		• 570907	..DIAPHRAGM , Service Accelerated Release Valve	1
1 - 25		567252	..PISTON , Service Accelerated Release Valve	1
1 - 26		566194	..PLUNGER , Service Accelerated Release Valve	1
1 - 27		• 524609	..O-RING , $\frac{1}{4}$ " O.D.	1
1 - 28		• 534527	..GASKET , $\frac{11}{16}$ " O.D. Ring	1
1 - 29		566188	..SEAT , Spring	1

• NOTE: See Repair Parts Kit Information on Page 5.


ABDT SERVICE PORTION, PART No. 593037- Figure 1 (Continued)

Figure & Ref. No.	Customer Part No.	Wabtec Part No.	Description	Qty.
1 - 30		571045	.. SPRING , Check Valve (See Page 8 for Spring Identification Chart)	1
1 - 31		• 569453	.. VALVE , Accelerated Release Check	1
1 - 32		566189	.. FILLING PIECE	1
1 - 33		• 563997	.. GASKET , Filling Piece	1
1 - 34		514280	.. BOLT , 1/2-13 x 1 1/8" Hex	4
1 - 35		566185	.. COVER , Bottom	1
1 - 36		• 533416	.. GASKET , 2" O.D. Ring	1
1 - 37		94581	.. SPRING , Check Valve (See Page 8 for Spring Identification Chart)	1
1 - 38		• 552203	.. VALVE , Back Flow Check	1
1 - 39		• 534527	.. GASKET , 1 1/16" O.D. Ring	1
1 - 40		• 95206	.. GASKET , 3 3/8" O.D. Ring	1
1 - 41		552280	.. SPRING , Piston Return (See Page 8 for Spring Identification Chart)	1
1 - 42		305921	.. CAGE , Spring	1
1 - 43		569374	.. NUT , 3/8" Self-locking	1
1 - 44		566182	.. SPRING , Brake Cylinder Limiting Valve (See Page 8 for Spring Identification Chart)	1
1 - 45		566181	.. FOLLOWER , Diaphragm	1
1 - 46		• 564587	.. DIAPHRAGM , Brake Cylinder Limiting Valve	1
1 - 47		660342	.. PISTON , Brake Cylinder Limiting Valve	1
1 - 48		• 534662	.. O-RING , 3/8" O.D.	3
1 - 49		593040	.. BODY (Includes Ref. Nos. 50 to 55)	1
1 - 50		57585	... PLUG , 3/8" NPT Choke (Port 10)	1
1 - 51		566219	... PLUG , 3/8" NPT Choke (Port 1)	1
1 - 52		538390	... PLUG , 3/8" NPT Choke (Port 1A)	1
1 - 53		95998	... PLUG , 1/8" NPT Choke (Face III)	1
1 - 54		578467	... NUT , 3/8" Hex Flanged	3
1 - 55		578466	... STUD , 1 1/2" Long	3
1 - 56		566198	.. RELEASE VALVE PORTION (See Figure 2)	1
1 - 57		• 534031	.. GASKET , 7/8" O.D. Ring	1
1 - 58		• 533532	.. GASKET , 1 3/16" O.D. Ring	5
1 - 59		• 588168	.. SCREEN , Filter	1
			• See Repair Parts Kit Information on Page 5	

□ **NOTE:** This Service Piston is fitted with plastic rings and provides Vibration Protection to the Portion. Service Piston without plastic rings, Part Number 566170 is also available for ordering.



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ABDT SERVICE PORTION REPAIR PARTS KIT, PART No. 576392

Figure & Ref. No.	Customer Part No.	Wabtec Part No.	Description	Qty.
1 & 2		576392	ABDT SERVICE PORTION REPAIR PARTS KIT (NOTE: Each Repair Parts Kit includes ALL items as listed)	Ref.
1 - 4		99458	GASKET , 1/4" Flange Fitting Ring	1
1 - 7		565048	DIAPHRAGM , Service Piston	1
1 - 24		570907	DIAPHRAGM , Service Accelerated Release Valve	1
1 - 27		524609	O-RING , 1/4" O.D.	1
1 - 28		534527	GASKET , 11/16" O.D. Ring	1
1 - 31		569453	VALVE , Accelerated Release Check	1
1 - 33		563997	GASKET , Filling Piece	1
1 - 36		533416	GASKET , 2" O.D. Ring	1
1 - 38		552203	VALVE , Back Flow Check	1
1 - 39		534527	GASKET , 11/16" O.D. Ring	1
1 - 40		95206	GASKET , 3 3/8" O.D. Ring	1
1 - 46		564587	DIAPHRAGM , Brake Cylinder Limiting Valve	1
1 - 48		534662	O-RING , 3/8" O.D.	3
1 - 57		534031	GASKET , 7/8" O.D. Ring	1
1 - 58		533532	GASKET , 13/16" O.D. Ring	5
1 - 59		588168	SCREEN , Filter	1
2 - 3		533212	GASKET , 1" O.D. Ring	1
2 - 7		570908	DIAPHRAGM , Release Valve	1
2 - 8		524612	O-RING , 1/2" O.D.	1
2 - 11		531868	O-RING , 3/4" O.D.	3
2 - 13		551156	VALVE , Check, Emergency and Auxiliary Reservoirs	2
2 - 17		531868	O-RING , 3/4" O.D.	3
2 - 20		532715	VALVE , Retaining Check	1
2 - 21		532715	VALVE , Retaining Check	1
2 - 28		564305	GASKET , Bottom Cover	1
2 - 29		527560	GASKET , 5/8" O.D. Ring	1
2 - 30		566205	SEAL , Valve	1
2 - 32		566214	SEAL , Protector	1
2 - 33		571140	RIVET , Pop	1

ABDT SERVICE PORTION WITH SHIPPING COVER COMBINATION

Figure & Ref.No.	Customer Part No.	Wabtec Part No.	Description	Qty.
			ABDT SERVICE PORTION with Fabricated Shipping Cover, less Accessories	Ref.
		593037	ABD SERVICE PORTION	1
		569668	COVER , Shipping	1

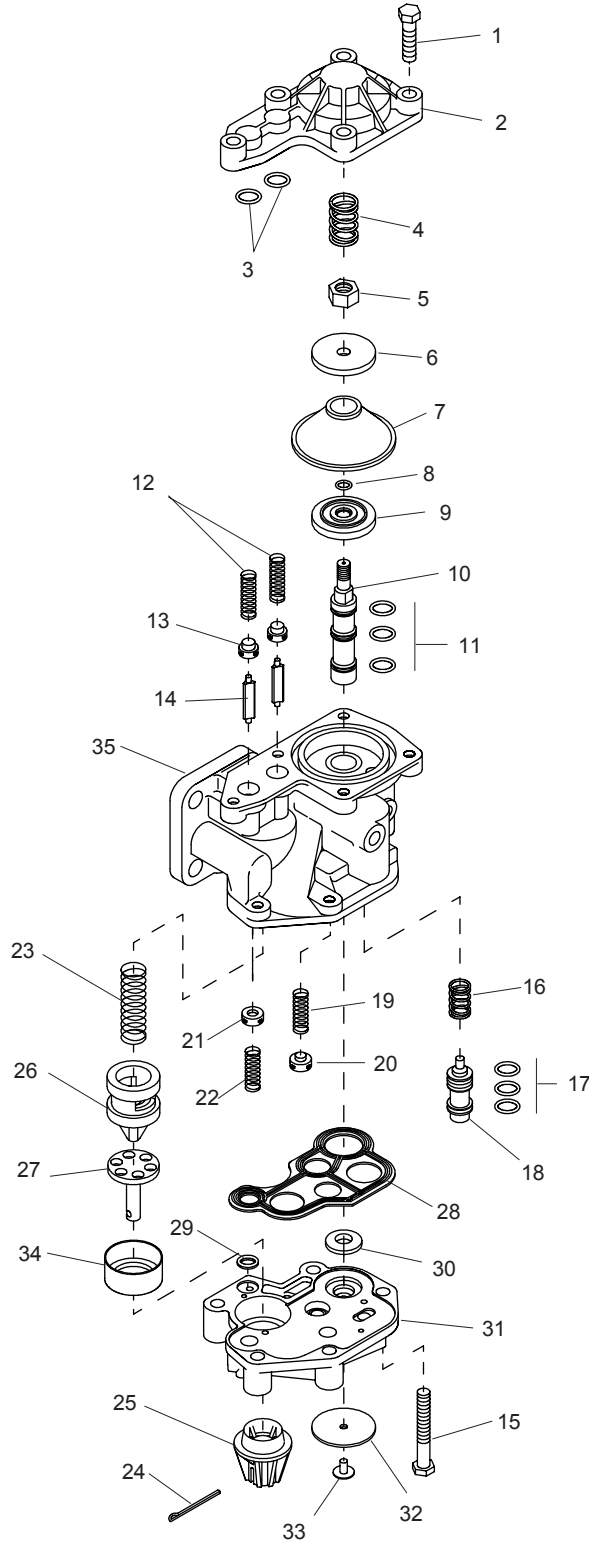


Figure 2 - Part No. 566198



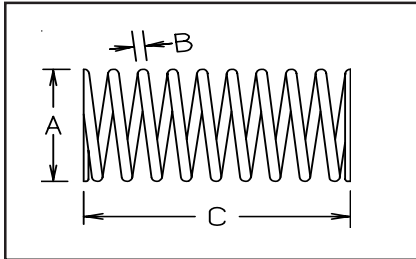
Parts Catalog

ABD RELEASE VALVE PORTION, PART No. 566198 - Figure 2

Figure & Ref. No.	Customer Part No.	Wabtec Part No.	Description	Qty.
2 -		566198	..RELEASE VALVE PORTION (Includes Ref. Nos. 1 to 35)	Ref.
2 - 1		523365	..BOLT , $\frac{3}{8}$ -16 x 1 $\frac{1}{2}$ " Hex	5
2 - 2		567675	..COVER , Top	1
2 - 3		• 533212	..GASKET , 1" O.D. Ring	2
2 - 4		566207	..SPRING , Release Spool Valve (See Page 8 for Spring Identification Chart)	1
2 -		310783	..RELEASE VALVE ASSEMBLY (Includes Ref. Nos. 5 to 11)	Ref.
2 - 5		569374	...NUT , $\frac{3}{8}$ " Self-locking	1
2 - 6		562908	...FOLLOWER , Diaphragm	1
2 - 7		• 570908	...DIAPHRAGM , Release Valve	1
2 - 8		• 524612	...O-RING , $\frac{1}{2}$ " O.D.	1
2 - 9		562907	...PISTON , Release Valve	1
2 - 10		566204	...VALVE , Release Spool	1
2 - 11		• 531868	...O-RING , $\frac{3}{4}$ " O.D.	3
2 - 12		552350	..SPRING , Check Valve, Emergency and Aux. Reservoirs (See Page 8 for Spring Identification Chart)	2
2 - 13		• 551156	..VALVE , Check, Emergency and Auxiliary Reservoirs	2
2 - 14		566215	..PLUNGER , Emergency and Auxiliary Reservoirs	2
2 - 15		562463	..BOLT , $\frac{3}{8}$ -16 x 1 $\frac{3}{4}$ " Hex	5
2 - 16		566210	..SPRING , Reset Spool Valve (See Page 8 for Spring Identification Chart)	1
2 -		310782	..RESET SPOOL VALVE ASSEMBLY (Includes Ref. Nos. 17 & 18)	Ref.
2 - 17		• 531868	...O-RING , $\frac{3}{4}$ " O.D.	3
2 - 18		566209	...VALVE , Reset Spool	1
2 - 19		32533	..SPRING , Check Valve, Retaining (See Page 8 for Spring Identification Chart)	1
2 - 20		• 532715	..VALVE , Retaining Check	1
2 - 21		• 532715	..VALVE , Reset Check	1
2 - 22		32533	..SPRING , Reset Check Valve (See Page 8 for Spring Identification Chart)	1
2 - 23		509512	..SPRING , Lifter (See Page 8 for Spring Identification Chart)	1
2 - 24		17963	..PIN , $\frac{3}{16}$ x 2" Cotter for Shipping	1
2 - 25		569669	..GUARD , Release Valve Stem for Shipping	1
2 - 26		566208	..LIFTER	1
2 - 27		94963	..STEM and END PLATE	1
2 - 28		• 564305	..GASKET , Bottom Cover	1
2 - 29		• 527560	..GASKET , $\frac{5}{8}$ " O.D. Ring	1
2 - 30		• 566205	..SEAL , Valve	1
2 - 31		566220	..COVER , Bottom (Includes Ref. Nos. 32, 33, and 34)	1
2 - 32		• 566214	...SEAL , Protector	1
2 - 33		• 571140	...RIVET , Pop	1
2 - 34		580075	...SLEEVE , Bottom Cover	1
2 - 35		566199	..BODY , Release Valve Portion	1

• See Repair Parts Kit Information on Page 5

SPRING IDENTIFICATION



The following table is shown to enable identification of the springs used in the devices catalogued herein. It is based on calculated figures and the actual spring will vary somewhat, due to the small differences in wire, coil diameter, number of turns, etc. This tabulation is intended for identification only and should not be used for any other purpose. It does not represent a specification for the springs mentioned. For proper operation of this device **ONLY** springs supplied by Wabtec Corporation are to be used in locations illustrated herein.

Part No.	Approx. Outside Dia. "A" In.	Approx. Dia. Wire "B" In.	Approx Free Height "C" In.	Approx. No. Turns *	Material
32533	$13/32$	$1/32$	$1^{1/16}$	10	Steel
93940	$5/32$	$1/64$	$2^{1/32}$	13	Bronze
94581	$1/2$	$1/32$	$1^{7/64}$	$7^{1/2}$	Bronze
509512	$4^{1/64}$	$3/32$	$1^{55/64}$	$8^{1/2}$	Steel
552280	$1^{5/8}$	$9/64$	$3^{1/4}$	$7^{1/4}$	Steel
552350	$9/32$	$1/32$	$1^{5/16}$	$9^{1/2}$	Steel
563920	$5/8$	$1/16$	$1^{5/16}$	$10^{1/2}$	Steel
566182	$5^{5/64}$	$5/64$	$1^{5/64}$	6	Steel
566207	$2^{7/32}$	$5/64$	$1^{17/64}$	$4^{1/2}$	Steel
566210	$4^{1/64}$	$1/16$	$1^{5/64}$	$6^{1/2}$	Steel
571045	$1/2$	$3/64$	$1^{1/4}$	4	Steel

*NOTE: Number of turns counted from extreme ends of wire.
All dimensions are shown in inches.

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