

VALVES • VESSELS • SYSTEMS • CONTROLS

H. A. Phillips & Co. 770 Enterprise Avenue DeKalb, IL 60115 Phone: 630-377-0050 Fax: 630-377-2706 www.haphillips.com

LP-081020 Effective August 10, 2020 Supercedes all previous List Prices

## **LIST PRICES**

WITH SIZES & MODEL NUMBERS

All prices shown are U.S. dollars and are subject to change without notice.

All prices shown are F.O.B. factory.

PRODUCT TYPE	PAGE NO.
Level Eyes® (Liquid Level Sight Glasses)	2
Injectors (Liquid Recirculating)	2
Flat Column Cap (Threaded for Probe)	2
Float Switch (Electromagnetic)	2
Pressure Gauges (Liquid Filled)	2
Filters/Strainers	2
Flanges & Flanged Unions	3
Water Testing Apparatus	3
High Side Float Valves & Pilot Operated Float Controls	4
Three-Way Valves (Solenoid Operated)	5
Check Valves (Disc Type and Piston Type)	5 - 6
Oil Float Valves (High Side and Low Side)	7
Low Side Float Valves & Pilot Operated Float Controls	7 - 9
Part Kits	10 - 11
Replacement Parts	12-14
RMA Policy & Limited Product Warranty	15
Terms and Conditions of Sale	16

Please consult factory for pricing on the following products:
Oil Pots, Level Eye® Columns, ASME Pressure Vessels, Liquid Return Systems,
Gas Pressure Recirculation Systems, Mechanical Pump Recirculation Systems,
PUR Air Purgers and Anhydrator System Cleaners

## LEVEL EYE® (LIQUID LEVEL SIGHT GLASSES)

REF: BULLETIN VB-18E-01

Square-End Weld Housings					
Part No. w/Reflex Lens	Length In.	List Price	Part No. w/Clear Lens	Length In.	List Price
1100-R	2"	\$150	1100	2"	\$167
1100-RN	2"	\$186	1100-N	2"	\$203
1100-RNX	2"	\$202	1100-NX	2"	\$219
1100A-R	3"	\$169	1100A	3"	\$186
1100A-RN	3"	\$205	1100A-N	3"	\$222
1100A-RNX	3"	\$221	1100A-NX	3"	\$238
1100L-R	4"	\$195	1100L	4"	\$212
1100L-RN	4"	\$231	1100L-N	4"	\$248
1100L-RNX	4"	\$247	1100L-NX	4"	\$264

	Threaded Housings - 1-1/2" MPT				
Part No.	Length		Part No.	Length	
w/Reflex Lens	ln.	List Price	w/Clear Lens	ln.	List Price
1100AT-R	3"	\$194	1100AT	3"	\$211
1100AT-RN	3"	\$230	1100AT-N	3"	\$247
1100AT-RNX	3"	\$246	1100AT-NX	3"	\$263
1100T-R	4"	\$223	1100T	4"	\$240
1100T-RN	4"	\$259	1100T-N	4"	\$276
1100T-RNX	4"	\$275	1100T-NX	4"	\$292
1100V-R †	2"	\$374	1100V †	2"	\$391
1100V-RN †	2"	\$410	1100V-N †	2"	\$427
1100V-RNX †	2"	\$426	1100V-NX †	2"	\$443
LOUNDT					

† 2" MPT

Stainless Steel, Square-End Weld Housing					
Part No. w/Reflex Lens	Length In.	List Price	Part No. w/Clear Lens	Length In.	List Price
1100S-R	2"	\$377	1100S	2"	\$394
1100S-RN	2"	\$413	1100S-N	2"	\$430
1100S-RNX	2"	\$429	1100S-NX	2"	\$446
1100LS-R	4"	\$464	1100LS	4"	\$481
1100LS-RN	4"	\$500	1100LS-N	4"	\$517
1100LS-RNX	4"	\$516	1100LS-NX	4"	\$533
S	Stainless	Steel, Saddle	e Milled Weld H	ousing	
1100SC-R	2"	\$388	1100SC	2"	\$405
1100SC-RN	2"	\$424	1100SC-N	2"	\$441
1100SC-RNX	2"	\$440	1100SC-NX	2"	\$457
1100LSC-R	4"	\$475	1100LSC	4"	\$492
1100LSC-RN	4"	\$511	1100LSC-N	4"	\$528
1100LSC-RNX	4"	\$527	1100LSC-NX	4"	\$544

Z IVIF I					
	Carbon Steel, Saddle-Milled Weld Housing				
Part No. w/Reflex Lens	Length In.	List Price	Part No. w/Clear Lens	Length In.	List Price
1100C-R	2"	\$161	1100C	2"	\$178
1100C-RN	2"	\$197	1100C-N	2"	\$214
1100C-RNX	2"	\$213	1100C-NX	2"	\$230
1100LC-R	4"	\$208	1100LC	4"	\$225
1100LC-RN	4"	\$244	1100LC-N	4"	\$261
1100LC-RNX	4"	\$260	1100LC-NX	4"	\$277

NOTE: Specify refrigerant type when ordering Level Eyes to ensure gasket compatibility

NOTE: Teflon gaskets available for all Level Eyes. Add \$40

3" PROBE-REA	DY COLUMN CAP
(Flat beveled cap,	w/3/4" threaded hole)
Part No.	List Price
3-3061	\$78

\*Level Eye welded on chamber

INJECTORS (LIQUID RECIRCULATING) REF: BULLETIN VB-18E-01		
Injector No.	List Price	
2020SL	\$459	
2100SL	\$594	
2100SLD	\$1,051	
2075WCB	\$803	
2100WCB	\$837	
2100WCBA	\$837	
2125WA	\$818	
2150WA	\$1,037	
2200WA	\$1,954	
2250WA	\$2,805	

ORDERING	INSTRUCTIONS	٠

1. Injector Number 4. Inlet pressure & temperature

3. Refrigerant 6. Load (tons)

7. Application

FLOAT SWITCHES (SS Chamber)			
Part No.	List Price		
SSLL	\$1,129		
SSLLLE*	\$1,632		
REPLACEMENT SWITCH ASSY			
SSLLSW†	\$598		
INTERNAL FLOAT SWITCH			
	A		

tincludes DIN connection	
GAUGES	

GAUGES			
1/4" MPT, LIC	QUID FILLED		
AMMONIA, w/	TEMP SCALE		
30"-150 psi	, 2-1/2" Dia.		
88-020	\$100		
30"-300 psi	, 2-1/2" Dia.		
88-021	\$100		
30"-150 p	si, 4" Dia.		
88-024	\$152		
30"-300 p	30"-300 psi, 4" Dia.		
88-025	\$152		
GENERIC, NO	TEMP SCALE		
30"-150 psi	, 2-1/2" Dia.		
88-026	\$139		
30"-400 psi	, 2-1/2" Dia.		

LEVEL E	/E TAP
(For chasing worn/c	rossed threads)
LEVEL EYE TAP*	\$1,050

\* Also available for lease - contact factory

LEVEL EYE TORQUE TOOL (Stainless Steel, fits 1/2" drive)		
Part No.	List Price	
LEVELEYETOOL	\$176	

FILTERS/STRAINERS				
REF: BULLETIN	VB-18E-0	)1		
Filter Number	List	w/IPS		
i iitei ivailibei	Price	flanges*		
510-1/2" FPT angle	\$224	-		
510-3/4" FPT angle	\$224	-		
575-3/4" FPT angle	\$454	-		
575-1" FPT angle	\$454	-		
575-1-1/4" FPT angle	\$454	-		
S701JRP, 1/2" or 3/4"	\$258	\$339		
S701, 1"	\$282	\$402		
S701A, 2"	\$749	\$904		
S701B, 3"	\$1,251	\$1,459		
*ODC flanges are also available. Consult factory				

\*ODC flanges are also available. Consult factory for pricing

#### NOTES:

- 1. 510 and 575 filters are zinc plated.
- 2. The S701 filters mate with series 700 and 701  $\,$

valves. Gasket, Nuts & Bolts included.

3. Flanges: Socket Weld standard, threaded available

	FLANGES  REF: BULLETIN VB-18E-01								
	Socket Weld		Threa		Weld	Weld Neck		Union Kits*	
Size	Part No.	List Price	Part No.	List Price	Part No.	List Price	Part No.	List Price	
1/2" oval	4-MS or 4-FS	\$36	4-MT or 4FT	\$43	N/A	-	KF075	\$9	
3/4" oval	6-MS or 6-FS	\$36	6-MT or 6FT	\$43	N/A	-	KF075	\$9	
1" oval	8-MSO or 8-FSO	\$42	8-MTO or 8-FTO	\$50	N/A	-	KFO100	\$9	
1" sq.	8-MS or 8-FS	\$54	8-MT or 8-FT	\$61	N/A	-	KF125	\$12	
1-1/4" sq.	10-MS or 10-FS	\$54	10-MT or 10FT	\$61	10-MW or 10-FW	\$146	KF125	\$12	
1-1/2" sq.	12-MS or 12-FS	\$69	12-MT or 12-FT	\$84	12-MW or 12-FW	\$173	KF150	\$12	
2"sq.	16-MS or 16-FS	\$69	16-MT or 16-FT	\$84	16-MW or 16-FW	\$177	KF200	\$17	
2-1/2" sq.	20-MS or 20-FS	\$83	N/A	-	20-MW or 20-FW	\$210	KF250	\$32	
3" sq.	24-MS or 24-FS	\$88	N/A	-	24-MW or 24-FW	\$246	KF300	\$32	
4" sq.	32-MS or 32-FS	\$102	N/A	-	32-MW or 32-FW	\$307	KF400	\$40	
5" rd.	40-MS or 40-FS	\$272	N/A	-	40-MW or 40-FW	\$512	KF500	\$68	
5" rd. York	40-MSY or 40-FSY	\$282	N/A		40-MWY or 40-FWY	\$522	KF500Y	\$68	
6" rd.	48-MS or 48-FS	\$302	N/A	-	48-MW or 48-FW	\$587	KF600	\$68	
6' rd. York	48-MSY or 48-FSY	\$312	N/A	-	48-MWY or 48-FWY	\$597	KF600Y	\$68	
8" rd.	64-MS or 64-FS	\$434	N/A	-	64-MW or 64-FW	\$604	KF800	\$76	
10" rd.	80-MS or 80-FS	\$702	N/A	-	80-MW or 80-FW	\$993	KF1000	\$108	

### ORDERING INSTRUCTIONS:

UNION KIT INCLUDES:

Gasket + required # of nuts & bolts to make a flanged union set

1. Flange Connection Type

2. Flange Size

3. Male or Female

	FLANGED UNIONS TONGUE & GROOVE  REF: BULLETIN VB-18E-01							
	Socke	t Weld	Thr	eaded	Weld N	Neck		
Size	Part No.	List Price	Part No.	List Price	Part No.	List Price		
1/2" oval	U-4S	\$81	U-4T	\$95	N/A	-		
3/4" oval	U-6S	\$81	U-6T	\$95	N/A	-		
1" oval	U-8SO	\$93	U-8TO	\$109	N/A	-		
1" sq.	U-8S	\$120	U-8T	\$134	N/A	-		
1-1/4" sq.	U-10S	\$120	U-10T	\$134	U-10W	\$304		
1-1/2" sq.	U-12S	\$150	U-12T	\$180	U-12W	\$358		
2"sq.	U-16S	\$155	U-16T	\$185	U-16W	\$371		
2-1/2" sq.	U-20S	\$198	N/A	-	U-20W	\$452		
3" sq.	U-24S	\$208	N/A	-	U-24W	\$524		
4" sq.	U-32S	\$244	N/A	-	U-32W	\$654		
5" rd.	U-40S	\$612	N/A	-	U-40W	\$1,092		
5" rd. York	U-40SY	\$632	N/A	-	U-40WY	\$1,112		
6" rd.	U-48S	\$672	N/A	-	U-48W	\$1,242		
6" rd. York	U-48SY	\$692	N/A	-	U-48WY	\$1,262		
8" rd.	U-64S	\$944	N/A	-	U-64W	\$1,284		
10" rd.	U-80S	\$1,512	N/A	-	U-80W	\$2,094		

#### ORDERING INSTRUCTIONS:

FLANGED UNIONS INCLUDE:

1. Union Connection Type

(1) male flange, (1) female flange, (1) union kit

2. Union Size

WATER TESTING APPARATUS  REF: BULLETIN ANW-SB17-01				
Part No.	Description	List Price		
ANH-MS	Moisture Sampling Flask, graduated 100ml capacity	\$163		
ANH-AS	Sampling stand kit, incl. (1) ANH-MS, stand, feed/vent assy, storage case	\$1,032		

## SERIES 700H PILOT OPERATED VALVES WITH SERIES 275AP FIXED LEVEL PILOT FLOAT VALVES

REF: BULLETIN VB-18E-01

	Flange Conns	Pilot Operated				Model 275AP and 275APF				
	IPS-THD. or	700H Valve				Fixed Level Pilot Float Valve		add for		
	Socket,	Zinc Plated (Standard)		add for		Zinc Plated (Standard)		ard)	Pilot Line	
Valve	ODC (copper	with	w/ Flanged	Valve	Weld Neck		with	with	Valve	Kit
Number	connectors)	Flanges	Strainer	Only	Flanges		Cast Ch.	Steel Ch.	Only	(See note)
500 H05 W(TH AM 00 HA (DE 15)										

FOR USE WITH AMMONIA (R717)

700JRH	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> ", 1"*	\$1,038	\$1,296	\$957	\$184
700XH	1", 1 <sup>1</sup> / <sub>4</sub> "	\$1,149	\$1,432	\$1,029	\$184
700AXH	1 <sup>1</sup> / <sub>2</sub> ", 2"	\$1,743	\$2,492	\$1,588	\$216
700BXH	3" **	\$2,713	\$3,964	\$2,505	\$316

\$891	\$1,950	\$560	\$219
\$891	\$1,950	\$560	\$219
\$891	\$1,950	\$560	\$219
\$891	\$1,950	\$560	\$219

FOR USE WITH HALOCARBONS

700JRHF	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> ",1"* (IPS)	\$1,038	\$1,296	\$957	\$184
	1 <sup>1</sup> / <sub>8</sub> ", 1 <sup>3</sup> / <sub>8</sub> " (ODC)	\$1,228	\$1,486	\$957	N/A
700XHF	1", 1 <sup>1</sup> / <sub>4</sub> " (IPS)	\$1,149	\$1,432	\$1,029	\$184
	1 <sup>5</sup> / <sub>8</sub> " (ODC)	\$1,371	\$1,654	\$1,029	N/A
700AXHF	1 <sup>1</sup> / <sub>2</sub> ", 2" (IPS)	\$1,743	\$2,492	\$1,588	\$216
	2 <sup>1</sup> / <sub>8</sub> " (ODC)	\$1,934	\$2,683	\$1,588	N/A
700BXHF	3" (IPS)**	\$2,713	\$3,964	\$2,505	\$316
	3 <sup>1</sup> / <sub>8</sub> " (ODC)	\$3,063	\$4,314	\$2,505	N/A

\$1,017	\$2,076	<b>\$686</b>	\$271
\$1,017	\$2,076	\$686	\$271
\$1,017	\$2,076	\$686	\$271
\$1,017	\$2,076	\$686	\$271
\$1,017	\$2,076	\$686	\$271
\$1,017	\$2,076	\$686	\$271
\$1,017	\$2,076	\$686	\$271
\$1,017	\$2,076	\$686	\$271
	\$1,017 \$1,017 \$1,017 \$1,017 \$1,017 \$1,017	\$1,017 \$2,076 \$1,017 \$2,076 \$1,017 \$2,076 \$1,017 \$2,076 \$1,017 \$2,076 \$1,017 \$2,076	\$1,017 \$2,076 \$686 \$1,017 \$2,076 \$686 \$1,017 \$2,076 \$686 \$1,017 \$2,076 \$686 \$1,017 \$2,076 \$686 \$1,017 \$2,076 \$686 \$1,017 \$2,076 \$686

<sup>\*</sup>Available 1" SW or FPT flanges, add \$12 LIST

NOTE: Pilot Line Kit available for R717: PLK-700H-A \$219 LIST

For halocarbons: PLK-700H-F \$271 LIST

Kit includes 1/4" angle valve, gauge valve, and pressure gauge

#### **ORDERING INSTRUCTIONS:**

For Pilot Valve: For Pilot Float Valve:

1. Pilot Operated Valve Number 1. Orifice Size

2. Orifice Size 2. Chamber requirements

- 3. Metering Plug
- 4. Spring
- 5. Flange Size, Type
- 6. Strainer (if required)
- 7. Serial Number, if replacement

#### **HIGH SIDE FLOAT VALVES SERIES 270A** REF: BULLETIN VB-18E-01 Valve w/ Chamber Valve Valve Only (Zinc Plated) Number Cast Steel FOR USE WITH AMMONIA (R717) 270A \$861 \$1,920 \$530 270AX \$1,432 \$2,491 \$1,101 270AY \$1,928 \$2,987 \$1,597 N/A \$774 270AZAZ N/A FOR USE WITH HALOCARBONS 270AF \$861 \$1,920 \$530 270AXF \$1,101 \$1,432 \$2,491 270AYF \$1,928 \$2,987 \$1,597 **MOUNTING FLANGE (FOR SERIES 270A)** 2-1/2" SOCKET WELD List Price Flange Number 298A\* \$134

#### FOR FACTORY SELECTION ASSISTANCE, ADVISE:

- 1. Refrigerant
- 2. Upstream and downstream pressures
- 3. Capacity
- 4. Degrees liquid subcooling

HIGH SIDE CONTROL PACKAGE 700H & 275AP VALVES W/ ACCESSORIES					
Control	Standard	with Pressure Regulator and			
Package	Items*	extra Service Valves			
FOR USE WITH AMMONIA (R717)					
RC-050	\$4,240	\$5,291			
RC-075	\$4,278	\$5,352			
RC-100	\$4,454	\$5,564			
RC-125	\$4,612	\$5,728			
RC-150	\$5,928	\$7,099			
RC-200	\$6,144	\$7,588			
RC-250	\$6,672	\$8,765			
RC-300	\$8,565	\$10,972			
RC-400	\$9,065	\$12,129			

<sup>\*</sup> Includes (1) 275AP valve and steel chamber with Level Eye, chamber, pilot line kit, 700H valve, service valves, and hand expansion valve. See Bulletin WP-18E-01.

#### **ORDERING INSTRUCTIONS:**

Same as above for Pilot Valve and Pilot Float Valve.

<sup>\*\*</sup> Socket weld or weld neck only

THREE-WAY VALVES SERIES 3000 REF: BULLETIN VB-18E-01		
Valve Number	List Price (Zinc Plated)	
3000N-3/4"	\$2,304	
3000AN-1-1/4"	\$3,198	

NOTE: Optional Pilot Light Coil, Add \$44

#### ORDERING INSTRUCTIONS:

1. Voltage 2. Hertz

CHECK VALVES: IN-LINE DISC TYPE  SERIES 600  REF: BULLETIN VB-18E-01					
	Flange Conn's.		add for		
Valve	I.P.S.; THD.	Valve w/	Weld Neck	Valve	
Number	or Socket	Flanges	Flanges	Only	
	CAST BODY - TYPE FORMERLY MANUFACTURED BY WOLF LINDE				
600JR	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> ", <b>1</b> "*	\$243	\$184	\$162	
600J	1¼" 1 <sup>1</sup> / <sub>2</sub> "	\$351	\$208	\$201	
600AJ	1 <sup>1</sup> / <sub>2</sub> ", 2"	\$514	\$216	\$359	
600BJ*	3"	\$952	\$316	\$744	
600DJ*	4"	\$1,399	\$410	\$1,155	
ALL STEEL BODY					
600K*	1", 1¼"	\$437	\$184	\$317	
600AK*	1 <sup>1</sup> / <sub>2</sub> ", 2"	\$569	\$216	\$414	

<sup>\*</sup> Gravity drain - add suffix 'S' if Heavy Spring is required (e.g. 600AKS).

#### **ORDERING INSTRUCTIONS:**

\*Available 1" SW or FPT flanges, add **\$12 LIST** 

1. Valve Number 2. Flange Size, Type

2. Flange Size and Type

	CHECK VALVES: IN-LINE PISTON TYPE, FLANGED SERIES 700X REF: BULLETIN VB-18E-01					
	Flange Connections:		add for		Valve Only	Close-Coupled
Valve	IPS Threaded or Socket;	Valve w/	Weld Neck	Valve W/	(Zinc Plated	Strainer
Number	ODC Copper	IPS Flanges	Flanges	ODC Flanges	as Standard)	Option*
700JRX	1/ <sub>2</sub> ", 3/ <sub>4</sub> ", 1"*(IPS) 1½", 1½" (ODC)	\$495	\$184	\$685	\$414	S701JR
700X	1", 1 <sup>1</sup> / <sub>4</sub> " (IPS) 1%" (ODC)	\$632	\$184	\$854	\$512	S701
700AX	1 <sup>1</sup> / <sub>2</sub> ", 2" (IPS) 21/ <sub>8</sub> " (ODC)	\$956	\$216	\$1,147	\$801	S701A
700BX	3" (IPS) 31/8" (ODC)	\$1,416	\$316	\$1,766	\$1,208	S701B

<sup>\*</sup>Close-coupled strainers available. See page 2 for strainer pricing

\*Available 1" SW or FPT flanges, add \$12 LIST

## ORDERING INSTRUCTIONS:

- 1. Valve Number
- 2. Spring Differential (2, 5, 10, 20, 35, 50, 60, and 70 lbs.)
- 3. Flange Size and Type
- 4. Valve Serial Number, if Replacement

#### **CHECK VALVES, GAS POWERED (PILOT OPERATED)** (GAS POWER TO CLOSE - SPRING TO OPEN) **SERIES 700S** REF: BULLETIN VB-18E-01 Flange Connections: add for Valve Only Close-Coupled Valve IPS Threaded or Socket; Valve w/ Weld Neck Valve w/ (Zinc Plated Strainer Number **ODC** Copper **IPS Flanges** Flanges **ODC** Flanges as Standard) Option\* 700JRS <sup>1</sup>/<sub>2</sub>", <sup>3</sup>/<sub>4</sub>",1"\*(IPS) 11/<sub>8</sub>", 13/<sub>8</sub>" (ODC) \$571 \$184 \$761 \$490 S701JR 700XS 1", 1<sup>1</sup>/<sub>4</sub>" (IPS) 15/8" (ODC) \$701 \$184 \$923 \$581 S701 700AXS 1<sup>1</sup>/<sub>2</sub>", 2" (IPS) 21/8" (ODC) \$1,041 \$216 \$1,232 \$886 S701A 3" (IPS)\*\* 31/8" (ODC) 700BXS \$1,480 \$316 \$1,830 S701B \$1,272

\*Available 1" SW or FPT flanges, add \$12 LIST

#### ORDERING INSTRUCTIONS:

1. Valve Number

2. Flange Size, Type

NOTE: No spring requirement necessary to order

	CHECK VALVES: THREE WAY  (SPRING TO OPEN - GAS FLOW TO ACTUATE)  SERIES 700T  REF: BULLETIN CV-700-T-67					
	Flange Connections:		add for		Valve Only	Close-Coupled
Valve	IPS Threaded or Socket;	Valve w/	Weld Neck	Valve w/	(Zinc Plated	Strainer
Number	ODC Copper	IPS Flanges	Flanges	ODC Flanges	as Standard)	Option*
700XT	1", 1 <sup>1</sup> / <sub>4</sub> " (IPS) 1%" (ODC)	\$781	\$184	\$1,003	\$661	S701
700AXT	1 <sup>1</sup> / <sub>2</sub> ", 2" (IPS) 2½" (ODC)	\$1,320	\$216	\$1,511	\$1,165	S701A
700BXT	3" (IPS)** 3½" (ODC)	\$2,049	\$316	\$2,399	\$1,841	S701B

<sup>\*</sup>Close-coupled strainers available. See page 2 for strainer pricing

#### **ORDERING INSTRUCTIONS:**

- 1. Valve Number
- 2. Flagne Size and Type

<sup>\*</sup>Close-coupled strainers available. See page 2 for strainer pricing

<sup>\*\* 3&</sup>quot; Flanges not available threaded

<sup>\*\* 3&</sup>quot; Flanges not available threaded

# LOW SIDE FLOAT VALVES FIXED LEVEL - DIRECT FEED (INTERNAL MOUNT) SERIES 300H

REF: BULLETIN VB-18E-01

	NEF. E
Valve	List Price
Number	(Zinc Plated)
FOR USE WITH AMMONIA	A (R717)
300H	\$926
300HD	\$948
300HM	\$953
300HMD	\$973
300A	\$1,229
300AM	\$1,270

Valve	List Price
Number	(Zinc Plated)
FOR USE WITH HALOCAR	BONS
300HF	\$1,010
300HDF	\$1,031
300HMF	\$1,036
300HMDF	\$1,056
300AF	\$1,240
300AMF	\$1,282

Note: Valves can be applied as pilots for Series 701 Pilot Operated Valves. Add \$1257 for 398A Steel Chamber

LOW SIDE FLOAT VALVES FIXED LEVEL - REMOTE FEED (INTERNAL MOUNT) SERIES 301H REF: BULLETIN VB-18E-01		
Valve	List Price	
Number	(Zinc Plated)	
FOR USE WITH AMMONIA	A (R717)	
301H	\$1,710	
301A	\$1,732	
FOR USE WITH HALOCARBONS		
301HF	\$1,792	

LOW SIDE FLOAT VALVES FIXED LEVEL - REMOTE FEED (EXTERNAL MOUNT) SERIES 301E REF: BULLETIN VB-18E-01				
Valve	Valve Only	Valve w/		
Number	(Zinc Plated)	Chamber		
FOR USE	FOR USE WITH AMMONIA (R717)			
301E	\$930	\$2,187		
301G	\$1,112	\$2,369		
301J	\$1,329	\$2,586		
301K	\$1,373	\$2,630		
FOR USE WITH HALOCARBONS				
301EF	\$1,022	\$2,279		
301GF	\$1,147	\$2,404		
301JF	\$1,363	\$2,620		

MOUNTING FLANGES			
(FOR SERIES 300 & 301)			
Flange Number List Price			
399 (3" F.P.T.)	\$141		
300WF3 (3" S.W.)	\$177		

SPECIAL APPLICATION		
Valve	Valve Only	
Number	(Zinc Plated)	
300WAXF	\$1,254	
300WCB	\$1,017	

#### **OIL FLOAT VALVES**

LOW SIDE OIL FEED VALVE (FOR ALL REFRIGERANT OILS) SERIES 275 REF: BULLETIN VB-18E-01					
Valve	Valve	Valve w/Chamber Valve Only			
Number	Cast	Cast Steel			
275AF	\$852	\$852 \$1,911 \$521			
MOUN	MOUNTING FLANGE 2-1/2" SOCKET WELD				
Flange Number List Price					
298A <b>\$134</b>					

#### **ORDERING INSTRUCTIONS:**

- 1. Valve Number
- 2. Orifice Size
- 3. With or without chamber
- 4. Mounting flanges #298A (if required)
- 5. Valve Serial Number, if replacement

HIGH SIDE OIL DRAIN VALVE (FOR ALL REFRIGERANT OILS) SERIES 270A REF: BULLETIN VB-18E-01					
Valve	Valve w/Chamber Valve Only				
Number	Cast	Cast Steel			
270A	\$861	\$1,920	\$530		
MOUN	MOUNTING FLANGE 2-1/2" SOCKET WELD				
Flange Number List Price					
2	298A <b>\$134</b>				

Note: Standard orifice is 3/32" and will operate with a pressure drop of 250 PSI maximum.

LOW SIDE FLOAT VALVES (ADJUSTABLE LEVEL - REMOTE FEED) SERIES 101 REF: BULLETIN VB-18E-01					
Valve	Valve Only	Valve w/			
Number	(Zinc Plated)	Chamber			
FOR USE	FOR USE WITH AMMONIA (R717)				
101	\$1,672	\$3,540			
101A	\$1,860	\$3,928			
FOR USE WITH HALOCARBONS					
101F	\$1,743	\$3,611			
101AF	\$2,091	\$4,160			

<sup>+</sup> See below for ordering instructions

1 <sup>9</sup>/<sub>16</sub>"

701BXS

S701B

4" (Weld Neck)

LOW SIDE FLOAT VALVES SERIES 101 SPECIAL APPLICATIONS REF: BULLETIN VB-18E-01						
Valve	Valve Only					
Number	(Zinc Plated)					
FOR USE WITH	HAMMONIA (R717)					
101CPS	\$2,040					
FOR USE WITI	FOR USE WITH HALOCARBONS					
101CPSF <b>\$2,083</b>						

PILOT OPERATED VALVE WITH
LOW SIDE ADJUSTABLE LEVEL PILOT FLOAT VALVES
REF: BULLETIN VB-18E-01

FOR USE WITH AMMONIA (R717)										
	701S Pilot Operated Valve							101 Pilo	t Float Valv	е
Pilot	Series		Available Connections			Valve Only				Valve Only
Operated	701		IPS - Thd. or Socket,	with	w/ Flanged	(Zinc	add for	Valve and Orifice	with	(Zinc
Valve	Port	Strainer	ODC (Copper Connectors)	Flanges	Strainer	Plated)	W.N. Flgs.	Size (in.)	Chamber	Plated)
701JRS	<sup>3</sup> / <sub>8</sub> ", <sup>9</sup> / <sub>16</sub> "	S701JR	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> ",1"*	\$1,085	\$1,343	\$1,004	\$184	101VP18 - 3/32"	\$3,540	\$1,672
701S	9/16", 23/32"	S701	1", 1 <sup>1</sup> / <sub>4</sub> "	\$1,196	\$1,478	\$1,076	\$184	101VP18 - 3/32"	\$3,540	\$1,672
701AS	<sup>7</sup> / <sub>8</sub> ", <sup>23</sup> / <sub>32</sub> "	S701A	1 <sup>1</sup> / <sub>2</sub> ", 2"	\$1,852	\$2,601	\$1,697	\$216	101VP26 - <sup>1</sup> / <sub>8</sub> "	\$3,928	\$1,860
701BS	1 <sup>1</sup> / <sub>4</sub> "	S701B	3" (SW or WN)	\$3,486	\$4,737	\$3,278	\$316	101VP26 - <sup>5</sup> / <sub>32</sub> "	\$3,928	\$1,860

#### FOR USE WITH HALOCARBONS

\$5,421

\$3,646

\$4,170

	701S Pilot Operated Valve						101 Pilot Float Valve		е	
Pilot	Series		Available Connections			Valve Only				Valve Only
Operated	701		IPS - THD. or Socket,	with	w/ Flanged	(Zinc	add for	Valve and Orifice	with	(Zinc
Valve	Port	Strainer	ODC (Copper Connectors)	Flanges	Strainer	Plated)	W.N. Flgs.	Size (in.)	Chamber	Plated)
701JRSF	<sup>3</sup> / <sub>8</sub> ", <sup>9</sup> / <sub>16</sub> "	S701JR	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> " (IPS), 1"*	\$1,085	\$1,343	\$1,004	\$184	101VPF18 - 3/32"	\$3,611	\$1,743
			1 <sup>1</sup> / <sub>8</sub> ", 1 <sup>3</sup> / <sub>8</sub> " (ODC)	\$1,275	\$1,533	\$1,004	N/A		\$3,611	\$1,743
701SF	9/16", 23/32"	S701	1", 1 <sup>1</sup> / <sub>4</sub> "	\$1,196	\$1,478	\$1,076	\$184	101VPF18 - 3/32"	\$3,611	\$1,743
			1 <sup>5</sup> / <sub>8</sub> " (ODC)	\$1,418	\$1,700	\$1,076	N/A		\$3,611	\$1,743
701ASF	<sup>7</sup> / <sub>8</sub> ", <sup>23</sup> / <sub>32</sub> "	S701A	1 <sup>1</sup> / <sub>2</sub> ", 2" (IPS)	\$1,852	\$2,601	\$1,697	\$216	101VPF26 - 1/8"	\$4,160	\$2,091
			2 <sup>1</sup> / <sub>8</sub> " (ODC)	\$2,043	\$2,792	\$1,697	N/A		\$4,160	\$2,091
701BSF	1 <sup>1</sup> / <sub>4</sub> "	S701B	3" (IPS) SW or WN	\$3,486	\$4,737	\$3,278	\$316	101VPF26 - <sup>5</sup> / <sub>32</sub> "	\$4,160	\$2,091
			3 <sup>1</sup> / <sub>8</sub> " (ODC)	\$3,836	\$5,087	\$3,278	N/A		\$4,160	\$2,091
701BXSF	1 <sup>9</sup> / <sub>16</sub> "	S701B	4" (Weld Neck)	\$4,170	\$5,421	\$3,646	N/A	101VPF26 - 3/16"	\$4,160	\$2,091

<sup>\*</sup>Available w/ 1" SW or FPT flanges, add **\$12 LIST** 

NOTE: Pilot Line Kit available for R717: PLK-701S-A, \$557; for Halocarbons: PLK-701S-F, \$406

N/A

Kits include  $\ensuremath{\mbox{\sc Kits}}$  include  $\ensuremath{\mbox{\sc Walve}}$  FPT Solenoid Valve & Angle Valve, Pressure Gauge and Gauge Valve.

#### **ORDERING INSTRUCTIONS:**

For Pilot Operated Valve: For Pilot Float Valve:

1. Pilot Operated Valve Number

1. Float Valve Number

2. Orifice Size 2. Orifice Size

Metering Plug
 Left or Right hand +
 Spring
 Chamber requirements
 Flange Size, Type
 Valve Serial No., if replacement

6. Strainer (if required)

7. Valve Serial No., if replacement For Pilot Kit: 1. Voltage 2. Hertz

+ Left Hand Flow (LHF): Arrow ← on Valve Body
+ Right Hand Flow (RHF): Arrow ← on Valve Body

#### FOR FACTORY SELECTION ASSISTANCE, ADVISE:

101VP26 - 3/16"

\$3,928

\$1,860

- 1. Refrigerant
- 2. Upstream and downstream pressures
- 3. Capacity
- 4. Degrees liquid subcooling

LOW SIDE FLOAT VALVES FIXED LEVEL - REMOTE FEED (EXTERNAL MOUNTING) SERIES 301E  REF: BULLETIN VB-18E-01								
Valve	Valve Only	Valve w/						
Number	(Zinc Plated)	Chamber						
FOR USE	FOR USE WITH AMMONIA (R717)							
301E	\$930	\$2,187						
301G	\$1,112	\$2,369						
301J	\$1,329	\$2,586						
301K	\$1,373	\$2,630						
FOR USE	FOR USE WITH HALOCARBONS							
301EF	\$1,022	\$2,279						
301GF <b>\$1,147 \$2,404</b>								
301JF	\$1,363	\$2,620						

	PILOT OPERATED VALVE WITH  LOW SIDE FIXED LEVEL PILOT FLOAT VALVE  REF: BULLETIN VB-18E-01  FOR USE WITH AMMONIA (R717)										
	701S Pilot Operated Valve 301 Pilot Valve										
Pilot	Series		Available Connections			Valve Only		Pilot	Pilot	30	1 Pilot Valve
Operated	701		IPS - THD. or Socket,	with	w/ Flanged	(Zinc	add for	Float	Valve	with	Valve Only
Valve	Port	Strainer	ODC (Copper Connectors)	Flanges	Strainer	Plated)	W.N. Flgs.	Valve	Orifice	Chamber	(Zinc Plated)
701JRS	<sup>3</sup> / <sub>8</sub> ", <sup>9</sup> / <sub>16</sub> "	S701JR	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> ", 1" *	\$1,085	\$1,343	\$1,004	\$184	301E	3/32", 1/8"	\$2,187	\$930
701S	9/16", 23/32"	S701	1", 1 <sup>1</sup> / <sub>4</sub> "	\$1,196	\$1,478	\$1,076	\$184	301E	<sup>3</sup> / <sub>32</sub> ", <sup>1</sup> / <sub>8</sub> "	\$2,187	\$930
701AS	<sup>7</sup> / <sub>8</sub> ", <sup>23</sup> / <sub>32</sub> "	S701A	1 <sup>1</sup> / <sub>2</sub> ", 2"	\$1,852	\$2,601	\$1,697	\$216	301E	<sup>1</sup> / <sub>8</sub> "	\$2,187	\$930
701BS	1 <sup>1</sup> / <sub>4</sub> "	S701B	3" (SW or WN)	\$3,486	\$4,737	\$3,278	\$316	301G	5/32"	\$2,369	\$1,112
701BXS	1 <sup>9</sup> / <sub>16</sub> "	S701B	4" (Weld neck)	\$4,170	\$5,421	\$3,646	N/A	301J	<sup>3</sup> / <sub>16</sub> "	\$2,586	\$1,329

FOR USE WITH HALOC	ARBONS
--------------------	--------

	701S Pilot Operated Valve					301 Pilot Valve					
Pilot	Series		Available Connections			Valve Only		Pilot	Pilot	30	1 Pilot Valve
Operated	701		IPS - THD. or Socket,	with	w/ Flanged	(Zinc	add for	Float	Valve	with	Valve Only
Valve	Port	Strainer	ODC (Copper Connectors)	Flanges	Strainer	Plated)	W.N. Flgs.	Valve	Orifice	Chamber	(Zinc Plated)
701JRSF	<sup>3</sup> / <sub>8</sub> ", <sup>9</sup> / <sub>16</sub> "	S701JR	<sup>1</sup> / <sub>2</sub> ", <sup>3</sup> / <sub>4</sub> ", 1" (IPS) *	\$1,085	\$1,343	\$1,004	\$184	301EF	3/32", 1/8"	\$2,279	\$1,022
			1 <sup>1</sup> / <sub>8</sub> ", 1 <sup>3</sup> / <sub>8</sub> " (ODC)	\$1,275	\$1,533	\$1,004	N/A			\$2,279	\$1,022
701SF	<sup>9</sup> / <sub>16</sub> ", <sup>23</sup> / <sub>32</sub> "	S701	1", 1 <sup>1</sup> / <sub>4</sub> " (IPS)	\$1,196	\$1,478	\$1,076	\$184	301EF	<sup>3</sup> / <sub>32</sub> ", <sup>1</sup> / <sub>8</sub> "	\$2,279	\$1,022
			1 <sup>5</sup> / <sub>8</sub> " (ODC)	\$1,418	\$1,700	\$1,076	N/A			\$2,279	\$1,022
701ASF	<sup>7</sup> / <sub>8</sub> ", <sup>23</sup> / <sub>32</sub> "	S701A	1 <sup>1</sup> / <sub>2</sub> ", 2" (IPS)	\$1,852	\$2,601	\$1,697	\$216	301EF	<sup>1</sup> / <sub>8</sub> "	\$2,279	\$1,022
			2 <sup>1</sup> / <sub>8</sub> " (ODC)	\$2,043	\$2,792	\$1,697	N/A			\$2,279	\$1,022
701BSF	11/4"	S701B	3" (IPS) SW or WN	\$3,486	\$4,737	\$3,278	\$316	301GF	5/32"	\$2,404	\$1,147
			3 <sup>1</sup> / <sub>8</sub> " (ODC)	\$3,836	\$5,087	\$3,278	N/A			\$2,404	\$1,147
701BXSF	1 <sup>9</sup> / <sub>16</sub> "	S701B	4" (Weld Neck)	\$4,170	\$5,421	\$3,646	N/A	301JF	<sup>3</sup> / <sub>16</sub> "	\$2,620	\$1,363

<sup>\*</sup>Available with 1" SW or FPT flanges, add \$12 LIST NOTE: Pilot Line Kit available for R717: PLK-701S-A, \$557; for Halocarbons: PLK-701S-F, \$406 Kits include Solenoid Valve, Angle Valve, Pressure Gauge and Gauge Valve.

#### **ORDERING INSTRUCTIONS:**

For Pilot Operated Valve:

1. Pilot Operated Valve Number

Orifice Size
 Metering Plug

. . .

4. Spring

5. Flange Size, Type6. Strainer (if required)

For Pilot Float Valve:

1. Float Valve Number

2. Orifice Size

3. Chamber requirement4. Valve Serial No.,

if replacement

FOR FACTORY SELECTION ASSISTANCE, ADVISE:

1. Refrigerant

2. Upstream and downstream pressures

3. Capacity

4. Degrees liquid subcooling

7. Valve Serial No., if replacement For Pilot Kit: 1. Voltage 2. Hertz

K100	PART KITS & CONTENTS REFERENCE
K100	2S & 3S Seat & Needle; 19 Gasket (2); 63 Gasket; 5-2 Spring
K101AB	152B & 153B Seat & Plunger; 1103 Gasket; 73 Gasket; 5AB45 Spring
K101ABF K101B	152B & 153B Seat & Plunger; 1103 Gasket; 73 Gasket; 705A114 Spring  152B & 153B Seat & Plunger; 1103 Gasket; 73 Gasket; 705A Spring
K101B K101BF	
	152B & 153B Seat & Plunger; 1103 Gasket; 73 Gasket; 705A114 Spring
K152K	152KCP Cartridge; 19 Gasket; 63 Gasket; 5-2A Spring
K152K26	152KCP Cartridge; 19 Gasket; 63 Gasket; 5-30A Spring
K152KCP	152KCP Cartridge; 19 Gasket; 63 Gasket; 5-30A Spring
K152KCPF	152KCP Cartridge; 19 Gasket; 63 Gasket; 5-60L Spring
K152KF18	152KCP Cartridge; 19 Gasket; 63 Gasket; 5-30 Spring
K152KF26	152KCP Cartridge; 19 Gasket; 63 Gasket; 5-60L Spring
K152L	152L Cartridge; 19 Gasket; 63 Gasket; 5-30A Spring (orifice up to 3/8"; 5-4 Spring with 13/32")
K152L18	152LCP Cartridge; 19 Gasket; 63 Gasket; 5-2A Spring
K152LCP	152LCP Cartridge; 19 Gasket; 63 Gasket; 5-30A Spring
K152LCPF	152LCP Cartridge; 19 Gasket; 63 Gasket; 5-60L Spring
K152LF	152L Cartridge; 19 Gasket; 63 Gasket; 5-61 Spring
K152LF18	152L Cartridge; 19 Gasket; 63 Gasket; 5-30 Spring
K210	310 Cartridge; 308 pusher; 725 Gasket
K210A	310A Cartridge; 308A Pusher; 725 Gasket
K270A1	262 & 403S Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411 Pin; 11S Spacers
K270A2	262A & 263A Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411 Pin; 11S Spacers
K270AX	262A & 263A Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411 Pin; 11S Spacers
K270AY	262AY & 263AY Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411 Pin; 11S Spacers
K270AZ	262AZ & 263AZ Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411-S Pin; 11S Spacers
K275AP1	262 & 403S Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411 Pin; 11S Spacers
K275AP2	262A & 263A Seat & Needle; 73 Gasket; 224 Hex Jam Nut; 55 Washer; 411 Pin; 11S Spacers
K280	280 Cartridge; 19 Gasket
K280-6	280-6 Cartridge; 19 Gasket
K310	310 Cartridge; 308 Pusher; 19 Gasket; 365 Gasket
K310A	310A Cartridge; 308A Pusher; 365 Gasket
K355	355 Cartridge; 365 Gasket
K600	604 Valve Piece; 477-K Spring; 11-222 O-ring; 63 Gasket (2) [K600S indicates kit with strong spring 477-1]
K600A	604A Valve Piece; 605A4 Spring; 11-229 O-ring; 73 Gasket (2) [K600AS indicates kit with strong spring 605A1]
K600AJ	604AJ Valve Piece; 73 Gasket (2); 605AJ
K600B	604B Valve Piece; 326 Gasket; 605B Spring; 326Y Gasket (2)
K600BJ	604BJ Valve Piece; 326Y Gasket (2); 605BJ Spring
K600BJS	604BJ Valve Piece; 326Y Gasket (2); 605BJS Spring
K600DJ	604DJ Valve Piece; 326YA Gasket (2); 605DJ Spring
K600J	604J Valve Piece, 63W Gasket (2), 605AJ Spring
K600JR	604JR Valve Piece, 728 Gasket (2), 605JR
K700JR	703 Seat Disc; 710 Gasket; 506 Gasket
K7005K	
	703A Seat Disc; 710 Gasket; 725N Gasket (2)
K700A	700-3A Seat Disc; 710A Gasket; 73 Gasket (2)
K700B	700-3B Seat Disc; 710B Gasket; 326Y Gasket (2)
K700AX	700-3AX Seat Disc; 710A Gasket; 73 Gasket 92)
K700BX	700-3BX Seat Disc; 710B Gasket; 326Y Gasket (2)
K700X	700-3X Seat Disc; 710 Gasket; 725N Gasket (2)
K700AP	73 Gasket (2); 700-4AP Piston; 705A Spring; 710A Gasket
K700BP	326Y Gasket (2) 700-4BP Piston; 705BL Spring; 710B Gasket
K700XT	11-215 O-Ring; 600D2-2 Check Valve; 700-3X Seat Disc; 705-10L Spring; 710 Gasket; 725N Gasket(2); 5000-131 Retaining Ring
K700AXT	11-222 O-Ring; 73 Gasket(2); 600D3-2 Check Valve; 700-3AX Seat Disc; 705A10L Spring; 710A Gasket; 5000-175 Retaining Ring
K700BXT	326Y Gasket (2); 600D3XT Check Valve; 700-3BX Seat Disc; 705B15X Spring; 710B Gasket
K701JR	703JR Seat Disc; 710JR Gasket; 506 Gasket (2)
K701	703 Seat Disc; 710 Gasket; 725N Gasket (2)
K701A	703A Seat Disc; 710A Gasket; 73 Gasket (2)
K701B	703B Seat Disc; 710B Gasket; 326Y Gasket (2)
K1100	1101 Clear Glass; 1103 Rubber Gasket; 1104 Fiber Gasket
K1100R	1101R Reflex Glass; 1103 Rubber Gasket; 1104 Fiber Gasket
K3000	3003JR & 3003 Seat Discs; 3012JRL & 3012L Push Rods; 3013 & 3013JR Nuts; 3010JR, 3010 & 3010N Gaskets; 705L Spring; 11-012 & 107 Orings; 027F0666 Seal Kit
K3000PS	3003JR & 3003 Seat Discs; 3012JRL & 3012L Push Rods; 3013 & 3013JR Nuts; 3010JR, 3010 & 3010N Gaskets; 705L Spring; 3004 & 3004JR Pistons; 3006 & 3006JR Seats; 11-012 & 107 O-rings; 027B1120 Solenoid
K3000A	3003A & 3003B Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; 11-012 & 107 O-rings; 027F0666 Seal Page 1000 Seat Discs; 3012A & 3012B Push Rods; 30
K3000APS	3003A & 3003B Seat Discs; 3012A & 3012B Push Rods; 710A, 710B & 3010AN Gaskets; 705AL Spring; plus 3004A & 3004B Pistons; 3006A & 3006B Seats; 11-012 & 107 O-rings; 027B1120 Solenoid

Kit Catalog No.   For Valve   Orifice Size (In.)   List Price	VAI	VE PARTS KITS: M	ISCELLANEO	US
K101AB	Kit Catalog No.	For Valve	Orifice Size (In.)	List Price
K101ABF	K100	100; 100VP	<sup>1</sup> / <sub>16</sub> to <sup>5</sup> / <sub>32</sub> ; <sup>3</sup> / <sub>16</sub>	\$462
K101B	K101AB	101AB	3/8; 1/2	\$840
K101BF	K101ABF	101ABF	3/8; 1/2	\$842
K152K	K101B	101B	3/8; 1/2; 5/8	\$848
K152K26	K101BF	101BF	3/8; 1/2; 5/8	\$848
K152KF18	K152K	101, 101VP18		\$543
K152KF18	K152K26	101VP-26" chamber	<sup>1</sup> / <sub>8;</sub> <sup>5</sup> / <sub>32</sub> ; <sup>3</sup> / <sub>16</sub>	\$532
K152KCP	K152KF18	101F; 101VPF-18" chamber	<sup>5</sup> / <sub>64</sub> to <sup>5</sup> / <sub>32</sub> ; <sup>3</sup> / <sub>16</sub>	\$532
K152KCP	K152KF26	101VPF-26" chamber	<sup>1</sup> / <sub>8;</sub> <sup>5</sup> / <sub>32</sub> ; <sup>3</sup> / <sub>16</sub>	\$559
K152KCPF	K152KCP	101CP		\$532
K152L	K152KCPF	101CPF		\$559
K152LF	K152L	101A		\$745
K152LF	K152L18	101A-18" chamber	1/4	\$756
K152LCP	K152LF	101AF	1/4; 5/16; 3/8; 13/32	\$745
K152LCP	K152LF18	101F-18" chamber	1/4	\$745
K210         210         3/32 to 9/64         \$401           K210A         210A         5/32, 3/16; 7/32         \$442           K270A1         270A, 270AF, 275AF         1/16; 5/64; 3/32         \$367           K270A2         270A, 270AF, 275AF         1/16; 5/64; 3/32         \$367           K270AZ         270AX         13/64         \$413           K270AY         270AY         3/8         \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         275AP; 275APF         1/16; 5/64; 3/32         \$367           K275AP1         275AP; 275APF         1/16; 5/64; 3/32         \$367           K280         225; 225B; 250; 250CB; 300P; 300H; 300HM; 300J; 300P; 300P; 300P; 301E         5/64; 3/32, 7/64; 1/8, 9/64         \$405           K310         300; 300H; 300HM; 300J; 300AM; 301G         5/32; 3/16; 7/32         \$440           K310AX         300A; 300AM; 301G         9/32         \$750           K355         301; 301H; 301J; 3/16; 3/16; 7/32; 9/32         \$832	K152LCP	101CP	<sup>1</sup> / <sub>4</sub> ; <sup>5</sup> / <sub>16</sub> ; <sup>3</sup> / <sub>8</sub>	\$745
K210         210         3/32 to 9/64         \$401           K210A         210A         5/32, 3/16; 7/32         \$442           K270A1         270A, 270AF, 275AF         1/16; 5/64; 3/32         \$367           K270A2         270A, 270AF, 275AF         1/16; 5/64; 3/32         \$367           K270AZ         270AX         13/64         \$413           K270AY         270AY         3/8         \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         275AP; 275APF         1/16; 5/64; 3/32         \$367           K275AP1         275AP; 275APF         1/16; 5/64; 3/32         \$367           K280         225; 225B; 250; 250CB; 300P; 300H; 300HM; 300J; 300P; 300P; 300P; 301E         5/64; 3/32, 7/64; 1/8, 9/64         \$405           K310         300; 300H; 300HM; 300J; 300AM; 301G         5/32; 3/16; 7/32         \$440           K310AX         300A; 300AM; 301G         9/32         \$750           K355         301; 301H; 301J; 3/16; 3/16; 7/32; 9/32         \$832	K152LCPF	101CPF		\$772
K210A         210A         5/32; ³/16; 7/32         \$442           K270A1         270A, 270AF, 275AF         ¹/16; ⁵/64; ³/32         \$367           K270A2         270A, 270AF, 275AF         ¹/16; ⁵/64; ³/32         \$367           K270AZ         270A, 270AF, 275AF         ¹/8; ³/16         \$413           K270AX         270AX         ¹³/64         \$413           K270AY         270AY         ³/8         \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         270AZAZ         \$367         \$413           K275AP1         275AP; 275APF         ¹/16; ⁵/64; ³/32         \$367           K275AP2         275AP; 275APF         ¹/8; ³/16         \$413           K280         225; 225B; 250; 250CB; 250CB; 250CB; 250CB; 250CB; 250CB; 250CB; 250CB; 250CB; 300P; 300H; 300HM; 300J; 300P; 300P; 301E         5/64; ³/32; ³/64; ⁵/32         \$593           K310         300; 300H; 300HM; 300J; 300P; 301E         5/64; ³/32; ³/16; ⁻/32         \$445           K310A         300A; 300AM; 301G         5/32; ³/16; ⁻/32         \$440           K310AX         300A; 300AM; 301G         9/32         \$750           K355         301; 301H; 301J; ³/16; ³/32; ³/32         \$832	K210	210		\$401
K270A1         270A, 270AF, 275AF         1/16; 5/64, 3/32         \$367           K270A2         270A, 270AF, 275AF         1/8; 3/16         \$413           K270AX         270AX         13/64         \$413           K270AY         270AY         3/8         \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         1/16; 5/64; 3/32         \$367           K275AP1         275AP; 275APF         1/16; 5/64; 3/32         \$367           K275AP2         275AP; 275APF         1/8; 3/16         \$413           K280         225; 225B; 250; 250CB; 250CB; 250CB; 250CP; 250CP; 250CP; 250CP; 250CP; 250CP; 250CP; 250VP; 250L; 250VPF; 251CP         5/64; 0 <sup>5</sup> /32         \$593           K310         300; 300H; 300HM; 300J; 300H; 300J; 300P; 300Y; 301E         5/64; 3/32; 7/64; 1/8; 9/64         \$405           K310A         300A; 300AM; 301G         5/32; 3/16; 7/32         \$440           K310AX         300A; 300AM; 301G         9/32         \$750           K355         301; 301H; 301J;         3/16; 7/32; 9/32         \$832	K210A	210A	<sup>5</sup> / <sub>32</sub> ; <sup>3</sup> / <sub>16</sub> ; <sup>7</sup> / <sub>32</sub>	\$442
K270AX         270AX         13/ <sub>64</sub> \$413           K270AY         270AY         3/ <sub>8</sub> \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         1/ <sub>16</sub> ; 5/ <sub>64</sub> ; 3/ <sub>32</sub> \$367           K275AP1         275AP; 275APF         1/ <sub>16</sub> ; 5/ <sub>64</sub> ; 3/ <sub>32</sub> \$367           K280         225; 225B; 250; 250CB;         5/ <sub>64</sub> to 5/ <sub>32</sub> \$593           K280         225; 225B; 250; 250CB;         5/ <sub>64</sub> to 5/ <sub>32</sub> \$593           K280-6         250VP (R717 only)         7/ <sub>64</sub> ; 9/ <sub>64</sub> ; 5/ <sub>32</sub> \$593           K310         300; 300H; 300HM; 300J;         5/ <sub>64</sub> ; 3/ <sub>32</sub> ; 7/ <sub>64</sub> ; 1/ <sub>8</sub> ; 9/ <sub>64</sub> \$405           K310A         300A; 300AM; 301E         5/ <sub>32</sub> ; 3/ <sub>16</sub> ; 7/ <sub>32</sub> \$440           K310AX         300A; 300AM; 301G         9/ <sub>32</sub> \$750           K355         301; 301H; 301J;         3/ <sub>16</sub> ; 7/ <sub>32</sub> ; 9/ <sub>32</sub> \$832	K270A1	270A, 270AF, 275AF	<sup>1</sup> / <sub>16</sub> ; <sup>5</sup> / <sub>64</sub> ; <sup>3</sup> / <sub>32</sub>	\$367
K270AY         270AY         3/ <sub>8</sub> \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         1/ <sub>16</sub> ; 5/ <sub>64</sub> ; 3/ <sub>32</sub> \$367           K275AP1         275AP; 275APF         1/ <sub>16</sub> ; 5/ <sub>64</sub> ; 3/ <sub>32</sub> \$367           K275AP2         275AP; 275APF         1/ <sub>8</sub> ; 3/ <sub>16</sub> \$413           K280         225; 225B; 250; 250CB; 250VP; 250CP; 250VP; 251CP         5/ <sub>64</sub> to 5/ <sub>32</sub> \$593           K280-6         250VP (R717 only)         7/ <sub>64</sub> ; 9/ <sub>64</sub> ; 5/ <sub>32</sub> \$593           K310         300; 300H; 300HM; 300J; 300P; 300F; 301E         5/ <sub>64</sub> ; 3/ <sub>32</sub> ; 7/ <sub>64</sub> ; 1/ <sub>8</sub> ; 9/ <sub>64</sub> \$405           K310A         300A; 300AM; 300AM; 300YA; 301G         5/ <sub>32</sub> ; 3/ <sub>16</sub> ; 7/ <sub>32</sub> \$440           K310AX         300A; 300AM; 301G         9/ <sub>32</sub> \$750           K355         301; 301H; 301J;         3/ <sub>16</sub> ; 7/ <sub>32</sub> ; 9/ <sub>32</sub> \$832	K270A2	270A, 270AF, 275AF	<sup>1</sup> / <sub>8</sub> ; <sup>3</sup> / <sub>16</sub>	\$413
K270AY         270AY         3/ <sub>8</sub> \$1,095           K270AZ         270AZ; 270AZA;         0.234         \$568           270AZAZ         1/ <sub>16</sub> ; 5/ <sub>64</sub> ; 3/ <sub>32</sub> \$367           K275AP1         275AP; 275APF         1/ <sub>16</sub> ; 5/ <sub>64</sub> ; 3/ <sub>32</sub> \$367           K275AP2         275AP; 275APF         1/ <sub>8</sub> ; 3/ <sub>16</sub> \$413           K280         225; 225B; 250; 250CB; 250VP; 250CP; 250VP; 251CP         5/ <sub>64</sub> to 5/ <sub>32</sub> \$593           K280-6         250VP (R717 only)         7/ <sub>64</sub> ; 9/ <sub>64</sub> ; 5/ <sub>32</sub> \$593           K310         300; 300H; 300HM; 300J; 300P; 300F; 301E         5/ <sub>64</sub> ; 3/ <sub>32</sub> ; 7/ <sub>64</sub> ; 1/ <sub>8</sub> ; 9/ <sub>64</sub> \$405           K310A         300A; 300AM; 300AM; 300YA; 301G         5/ <sub>32</sub> ; 3/ <sub>16</sub> ; 7/ <sub>32</sub> \$440           K310AX         300A; 300AM; 301G         9/ <sub>32</sub> \$750           K355         301; 301H; 301J;         3/ <sub>16</sub> ; 7/ <sub>32</sub> ; 9/ <sub>32</sub> \$832	K270AX	270AX	<sup>13</sup> / <sub>64</sub>	\$413
K270AZ       270AZ; 270AZA;       0.234       \$568         270AZAZ       0.234       \$568         K275AP1       275AP; 275APF       1/1,6; 5/64; 3/32       \$367         K275AP2       275AP; 275APF       1/8; 3/16       \$413         K280       225; 225B; 250; 250CB; 250CB; 250CB; 250CB; 250CB; 250CP; 250CP; 250CP       5/64 to 5/32       \$593         K280-6       250VP (R717 only)       7/64; 9/64; 5/32       \$593         K310       300; 300H; 300HM; 300J; 300H, 300H, 300J; 300P; 301E       \$764; 3/32; 7/64; 1/8; 9/64       \$405         K310A       300A; 300AM; 301G       5/32; 3/16; 7/32       \$440         K310AX       300A; 300AM; 301G       9/32       \$750         K355       301; 301H; 301J; 3/16; 7/32; 9/32       \$832	K270AY	270AY	3/8	\$1,095
K275AP1       275AP; 275APF       1/16; 5/64; 3/32       \$367         K275AP2       275AP; 275APF       1/8; 3/16       \$413         K280       225; 225B; 250; 250CB; 5/64 to 5/32       \$593         250P; 250L; 250VPF; 251CP       \$593       \$593         K310       300; 300H; 300HM; 300J; 5/64; 3/32; 7/64; 1/8; 9/64       \$593         K310       300; 300H; 300HM; 300J; 5/64; 3/32; 7/64; 1/8; 9/64       \$405         K310A       300A; 300AM; 301E       5/32; 3/16; 7/32       \$440         K310AX       300A; 300AM; 301G       9/32       \$750         K355       301; 301H; 301J; 3/16; 7/32; 9/32       \$832	K270AZ	270AZ; 270AZA;		\$568
K275AP2         275AP; 275APF         1/8; 3/16         \$413           K280         225; 225B; 250; 250CB; 250CB; 250CB; 250CP; 250CP; 250CP; 250CP; 250CP; 250CP; 250CP; 251CP         5/64 to 5/32         \$593           K280-6         250VP (R717 only)         7/64; 9/64; 5/32         \$593           K310         300; 300H; 300HM; 300J; 300P; 300P; 300P; 300P; 301E         \$64; 3/32, 7/64; 1/8; 9/64         \$405           K310A         300A; 300AM; 300AM; 5/32; 3/16; 7/32         \$440           K310AX         300A; 300AM; 301G         9/32         \$750           K355         301; 301H; 301J; 3/16; 7/32; 9/32         \$832		270AZAZ		
K280     225; 225B; 250; 250CB;     5/ <sub>64</sub> to <sup>5</sup> / <sub>32</sub> \$593       250P; 250L; 250VPF; 251CP     5/ <sub>64</sub> to <sup>5</sup> / <sub>32</sub> \$593       K280-6     250VP (R717 only)     7/ <sub>64</sub> , <sup>9</sup> / <sub>64</sub> , <sup>5</sup> / <sub>32</sub> \$593       K310     300; 300H; 300HM; 300J; 300P; 300P; 300P; 301E     \$/ <sub>64</sub> , <sup>3</sup> / <sub>32</sub> , <sup>7</sup> / <sub>64</sub> , <sup>1</sup> / <sub>8</sub> , <sup>9</sup> / <sub>64</sub> \$405       K310A     300A; 300AM; 300AM; 5/ <sub>32</sub> ; <sup>3</sup> / <sub>16</sub> ; <sup>7</sup> / <sub>32</sub> \$440       K310AX     300A; 300AM; 301G     9/ <sub>32</sub> \$750       K355     301; 301H; 301J; 3/ <sub>16</sub> ; <sup>7</sup> / <sub>32</sub> ; <sup>9</sup> / <sub>32</sub> \$832	K275AP1	275AP; 275APF	1/16; 5/64; 3/32	\$367
250P; 250L; 250VPF; 251CP  K280-6 250VP (R717 only) 7/ <sub>64</sub> ; 9/ <sub>64</sub> ; 5/ <sub>32</sub> \$593  K310 300; 300H; 300HM; 300J; 5/ <sub>64</sub> ; 3/ <sub>32</sub> , 7/ <sub>64</sub> ; 1/ <sub>8</sub> ; 9/ <sub>64</sub> \$405  300P; 300Y; 301E  K310A 300A; 300AM; 5/ <sub>32</sub> ; 3/ <sub>16</sub> ; 7/ <sub>32</sub> \$440  300YA; 301G  K310AX 300A; 300AM; 301G 9/ <sub>32</sub> \$750  K355 301; 301H; 301J; 3/ <sub>16</sub> ; 7/ <sub>32</sub> ; 9/ <sub>32</sub> \$832	K275AP2	275AP; 275APF	<sup>1</sup> / <sub>8</sub> ; <sup>3</sup> / <sub>16</sub>	\$413
K280-6       250VP (R717 only)       7/ <sub>64</sub> ; 9/ <sub>64</sub> ; 5/ <sub>32</sub> \$593         K310       300; 300H; 300HM; 300J, 300H; 5/ <sub>64</sub> ; 3/ <sub>32</sub> ; 7/ <sub>64</sub> ; 1/ <sub>8</sub> ; 9/ <sub>64</sub> \$405         K310A       300P; 300Y; 301E       5/ <sub>64</sub> ; 3/ <sub>32</sub> ; 7/ <sub>64</sub> ; 1/ <sub>8</sub> ; 9/ <sub>64</sub> \$440         K310A       300A; 300AM; 301G       5/ <sub>32</sub> ; 3/ <sub>16</sub> ; 7/ <sub>32</sub> \$440         K310AX       300A; 300AM; 301G       9/ <sub>32</sub> \$750         K355       301; 301H; 301J;       3/ <sub>16</sub> ; 7/ <sub>32</sub> ; 9/ <sub>32</sub> \$832	K280	225; 225B; 250; 250CB;	<sup>5</sup> / <sub>64</sub> to <sup>5</sup> / <sub>32</sub>	\$593
K310   300; 300H; 300HM; 300J;   5/ <sub>64</sub> ; <sup>3</sup> / <sub>32</sub> ; <sup>7</sup> / <sub>64</sub> ; <sup>1</sup> / <sub>8</sub> ; <sup>9</sup> / <sub>64</sub>   \$405     K310A   300A; 300AM;   5/ <sub>32</sub> ; <sup>3</sup> / <sub>16</sub> ; <sup>7</sup> / <sub>32</sub>   \$440     K310AX   300A; 300AM; 301G   9/ <sub>32</sub>   \$750     K355   301; 301H; 301J;   3/ <sub>16</sub> ; <sup>7</sup> / <sub>32</sub> ; <sup>9</sup> / <sub>32</sub>   \$832		250P; 250L; 250VPF; 251CP		
300P; 301E	K280-6	250VP (R717 only)	<sup>7</sup> / <sub>64</sub> ; <sup>9</sup> / <sub>64</sub> ; <sup>5</sup> / <sub>32</sub>	\$593
K310A 300A; 300AM; 5/ <sub>32</sub> ; 3/ <sub>16</sub> ; 7/ <sub>32</sub> \$440 300YA; 301G \$10AX 300A; 300AM; 301G \$9/ <sub>32</sub> \$750 K355 301; 301H; 301J; 3/ <sub>16</sub> ; 7/ <sub>32</sub> ; 9/ <sub>32</sub> \$832	K310	300; 300H; 300HM; 300J;	<sup>5</sup> / <sub>64</sub> ; <sup>3</sup> / <sub>32;</sub> <sup>7</sup> / <sub>64;</sub> <sup>1</sup> / <sub>8;</sub> <sup>9</sup> / <sub>64</sub>	\$405
300YA; 301G  K310AX 300A; 300AM; 301G 9/32 \$750  K355 301; 301H; 301J; 3/16; 7/32; 9/32 \$832		300P; 300Y; 301E		
K310AX 300A; 300AM; 301G $^9/_{32}$ \$750 K355 301; 301H; 301J; $^3/_{16}$ ; $^7/_{32}$ ; $^9/_{32}$ \$832	K310A	300A; 300AM;	5/32; 3/16; 7/32	\$440
K355 301; 301H; 301J; ${}^{3}/_{16}$ ; ${}^{7}/_{32}$ ; ${}^{9}/_{32}$ \$832		300YA; 301G		
K355 301; 301H; 301J; ${}^{3}/_{16}$ ; ${}^{7}/_{32}$ ; ${}^{9}/_{32}$ \$832	K310AX	300A; 300AM; 301G	9/32	\$750
301K; 301D; 301A	K355	301; 301H; 301J;	<sup>3</sup> / <sub>16</sub> ; <sup>7</sup> / <sub>32</sub> ; <sup>9</sup> / <sub>32</sub>	\$832
		301K; 301D; 301A		

<sup>\*</sup>Use the 5/64" Orifice Only in a 301E Valve

KITS: CHECK VALVES (DISC TYPE)								
Kit Catalog No.	For Valve	Line Size (In.)	List Price					
K600	600; 600K	1, 1 <sup>1</sup> / <sub>4</sub>	\$164					
K600S	600; 600K	1, 1 <sup>1</sup> / <sub>4</sub>	\$164					
K600A	600A; 600AK	1 <sup>1</sup> / <sub>2</sub> , 2	\$234					
K600AJ	600AJ	1 <sup>1</sup> / <sub>2</sub> , 2	\$193					
K600AS	600A; 600AK	1 <sup>1</sup> / <sub>2</sub> , 2	\$234					
K600BJ	600BJ	3	\$453					
K600BJS	600BJS	3	\$464					
K600DJ	600DJ	4	\$465					
K600J	600J	1¼ , 1½	\$123					
K 600JR	600JR	1/2, 3/4, 1	\$90					

#### **ORDERING INSTRUCTIONS:**

- 1. Orifice size
- 2. Valve Serial Number
- 3. Load in Tons
- 4. Refrigerant

KITS	KITS: CHECK VALVES (PISTON TYPE)								
Kit Catalog No.	For Valve	Line Size (In.)	List Price						
K700JR	700JR; 700JRS; 700JRX;	<sup>1</sup> / <sub>2</sub> ; <sup>3</sup> / <sub>4</sub>	\$39						
	700JRH; 700JRXH								
K700	700; 700S; 700H	1, 1 <sup>1</sup> / <sub>4</sub>	\$60						
K700A	700A; 700AS; 700AH	1 <sup>1</sup> / <sub>2</sub> , 2	\$249						
K700B	700B; 700BS; 700BH	3	\$201						
K700X	700X; 700XS; 700XH	1, 1 <sup>1</sup> / <sub>4</sub>	\$51						
K700AX	700AX; 700AXS; 700AXH	1 <sup>1</sup> / <sub>2</sub> , 2	\$61						
K700BX	700BX; 700BXS; 700BXH	3	\$111						

KITS: LOW SIDE PILOT OPERATED VALVES							
Kit Catalog No.	For Valve	Line Size (in.)	List Price				
K701JR	701JR; 701JRS	1/2; 3/4	\$41				
K701	701; 701S	1, 1 <sup>1</sup> / <sub>4</sub>	\$49				
K701A	701A; 701AS	1 <sup>1</sup> / <sub>2</sub> , 2	\$60				
K701B	701B; 701BS	3	\$87				

If a replacement spring is required for any of these valves, we must be advised of the Valve Serial Number.

KITS: 3-WAY SOLENOID OPERATED VALVES							
Kit Catalog No.	For Valve	Line Size (in.) *	List Price				
K3000	3000 & 3000N	3/4	\$229				
K3000PS	3000 & 3000N	3/4	\$836				
K3000A	3000A	1 <sup>1</sup> / <sub>4</sub>	\$337				
K3000APS	3000A	1 <sup>1</sup> / <sub>4</sub>	\$1,228				

\*Actual valve IPS. Pipe lines run to the 3-way valves can be as indicated, or may be one or two pipe sizes larger.

KITS: 3-WAY CHECK VALVES							
Kit Catalog No.	For Valve	Line Size (in.)	List Price				
K700XT	700XT	1, 1 <sup>1</sup> / <sub>4</sub>	\$541				
K700AXT	700AXT	1 <sup>1</sup> / <sub>2</sub> , 2	\$868				
K700BXT	700BXT	3	\$1,423				

KITS: LEVEL EYE®						
Kit Catalog No.	For Level Eye <sub>®</sub>	List Price				
K1100	Clear Level Eye <sub>®</sub>	\$97				
K1100R	Reflex Level Eye <sub>®</sub>	\$80				
K1100-T	Clear Level Eye® w/Teflon Gasket	\$137				
K1100R-T	Reflex Level Eye® w/Teflon Gasket	\$120				

KITS: INTERRUPTING VALVES							
Kit Catalog No.	For Valve	Line Size (in.)	List Price				
K700AP	700AP	1 <sup>1</sup> / <sub>2</sub> , 2	\$351				
K700BP	700BP	3	\$811				

#### NOTES:

- 1. Ordering instruction data required for the float controls only.
- Failure to furnish at least one of the above requirements will mean a delay in filling the order, as our factory will have to seek the information before a shipment can be made.
- 3. If a replacement spring is required for any of the valves we must be advised of complete Valve Number, such as 700X5-DE.

	REPLACEMENT PARTS							
PART NO.	DESCRIPTION	LIST PRICE	PART NO.	DESCRIPTION	LIST PRICE	PART NO.	DESCRIPTION	LIST PRICE
2S&3S	SEAT & NEEDLE	\$384	63W	GASKET	\$6	272AY	PUSHER	\$158
2S&403S	SEAT & NEEDLE	\$304	67-8"	FLOAT	\$632	272M	PUSHER	\$107
4	ADJUSTING NUT	\$47	67-16"	FLOAT	\$674	272X	NEEDLE	\$40
4B	ADJUSTING NUT	\$47	67F-8"	FLOAT	\$590	273AY	GLAND	\$219
5G	GASKET	\$18	67F-16"	FLOAT	\$646	273M	GLAND	\$120
5GY	GASKET	\$18	68-8"	FLOAT	\$857	273X	BOSS	\$94
5-2	SPRING			FLOAT	\$885	275	FLOAT BLOCK	\$111
5-2A	SPRING	-	68F-8"	FLOAT	\$913	276	LEVER	\$42
5-30A	SPRING	\$9	68F-12"	FLOAT	\$921	277	LINK	\$81
5-60L	SPRING	\$36	69	FLOAT	\$1,194	278	LINK	\$81
5-61	SPRING	\$11		BOLT	\$3	280	CARTRIDGE	\$587
5AB45	SPRING	\$36		GASKET		281M	SCREEN	\$6
6	SPRING CONE	\$32	73L	GASKET	\$10	284	ROD	\$24
6G	GASKET	\$20	74	GASKET	\$9	285A	SPRING	\$8
	GASKET	\$20	74 75H	O-RING	\$17	289		\$8
6GY							GASKET	
6T -	SPRING CONE	\$42	75K	O-RING	\$11	290S	STOP	\$15
/	STEM	\$112	79	FLOAT	\$239	291	CAP	\$72
7B	STEM	\$57		PIPE PLUG	\$8	292	GASKET	\$9
8	GLAND	\$29	87	LOCK NUT	\$5	293	GLAND	\$12
8B	GLAND	\$79	87S	LOCK NUT	\$12	294	STEM	\$84
9AP	BONNET	\$441	88	LOCK NUT	\$6	296	SCREW	\$9
9B	BONNET	\$248	90P	PIPE PLUG	\$20	299A	CHAMBER	\$331
9BF	BONNET	\$784	107	O-RING	\$6	302D	DISC	\$32
9BP	BONNET	\$784	108	O-RING	\$6	304	FOLLOWER	\$5
9F	BONNET	\$208	151B	GLAND	\$111	304A	FOLLOWER	\$7
10	LEVER	\$136	152B&153B	SEAT & PLUNGER	\$788	305A	SPRING	\$4
10B	LEVER	\$244	152KCP	CARTRIDGE	\$511	307	BOSS	\$135
10CP	LEVER	\$202	152LCP	CARTRIDGE	\$724	307A	BOSS	\$219
10-11-1/2	LEVER	\$142	153B	PLUNGER ASSY	\$661	307ACB	BOSS	\$144
10-8-1/2-101	LEVER	\$142	204E	ADJUSTING NUT	\$38	307B	BOSS	\$225
10-8-1/2-101A	LEVER	\$142	211	SPRING PIN	\$5	307E	BOSS	\$230
11	LEVER PIN	\$11	211AY	SPRING PIN	\$5	307G	BOSS	\$131
11&SPACER	LEVER PIN	\$23	211X	SPRING PIN	\$5	307H	BOSS	\$227
11B	LEVER PIN	\$12	213A	FLOAT BLOCK	\$152	307J	BOSS	\$131
118	LEVER PIN	\$17	215CB	FLOAT BLOCK	\$123	308	PUSHER	\$67
11-012	O-RING	\$3	220	FLOAT	\$271	308A	PUSHER	\$80
11-210/11-215	O-RING	\$9	220A	FLOAT	\$138	308ACB	PUSHER	\$334
11-216/11-222	O-RING	\$12	220PS	FLOAT	\$681	309	GASKET	\$5
11-225/11-229	O-RING	\$12	220PSF	FLOAT	\$853	309A	GASKET	\$4
12	PIPE PLUG	\$8	224	LOCK NUT	\$8	310	CARTRIDGE	\$326
13	BUSHING	\$168		CAP SCREW	\$5	310A	CARTRIDGE	\$354
14	PLUG		228	STOP		310AX	CARTRIDGE	\$410
14CB	PLUG		228A	SCREW		311A	SCREEN	\$16
14NP	PLUG		230	FLOAT BLOCK		313	FLOAT ROD	\$60
15	SPRING		230A	FLOAT BLOCK		313A	FLOAT ROD	\$87
16	SPRING CONE		230X	FLOAT BLOCK		313AM	FLOAT ROD	\$79
18	SCREEN		230Z	FLOAT BLOCK		313CP	FLOAT ROD	\$147
19	GASKET		231	LINK		313CPS	FLOAT ROD	\$279
24	BOLT		243CB	FLOAT ROD		313HM	FLOAT ROD	\$279
						313HW 313R		
24A	BOLT		261	SEALING WASHER			FLOAT ROD	\$35 \$62
24B	BOLT		262&403S	SEAT BSHG. & NEEDLE	\$259		CAM NEEDLE	\$63
24C	BOLT		262A&263A	SEAT BSHG. & NEEDLE		314A	CAM NEEDLE	\$65
24D	BOLT		262AY&263AY	SEAT BSHG. & NEEDLE		314E	CAM NEEDLE	\$67
24E	BOLT		262AZ&263AZ	SEAT BSHG. & NEEDLE	\$435		CAM NEEDLE	\$65
55	LOCK WASHER		265AY	SPRING		315	FLOAT BLOCK	\$88
55A	LOCK WASHER		265C	SPRING		315ACB	FLOAT BLOCK	\$444
56	COTTER PIN	\$5	265D-S	SPRING	\$17	315P	FLOAT BLOCK	\$84
57	NUT	\$2	265E	SPRING	\$11	315PA	FLOAT BLOCK	\$138
58	NUT	\$3	267	FLOAT	\$328	315PM	FLOAT BLOCK	\$166
59	NUT	\$4	267AZAZ	FLOAT	\$596	315R	FLOAT BLOCK	\$121
60	NUT		267F	FLOAT		315WA	FLOAT BLOCK	\$122
62	BOLT		267Y	FLOAT		315WCB	FLOAT BLOCK	\$74
63	GASKET		270M	ADJUSTING NUT		316	SET SCREW	\$9
00	O/ IOINE I	\$0	Z / OIVI	ADJUSTING NOT	φZ9	010	OL 1 GOILLYV	фэ

	REPLACEMENT PARTS							
PART NO.	DESCRIPTION	LIST PRICE	PART NO.	DESCRIPTION	LIST PRICE	PART NO.	DESCRIPTION	LIST PRICE
317J	NEEDLE	\$50	576	FLANGE	\$124	700-4AXHS	PISTON	\$364
318P	STOP	\$38	577	CAP SCREW	\$6	700-4AXS	PISTON	\$236
319P	ADJUSTING PIECE	\$12	580	SCREEN	\$271	700-4AXT	PISTON	\$657
321M	FLOAT	\$152	600D2	CHECK VALVE w/FLGS	\$641	700-4BP	PISTON	\$654
321MF	FLOAT	\$191	600D2-2	INNER CHECK VALVE	\$452	700-4BX	PISTON	\$290
321WCB	FLOAT	\$402	600D3	CHECK VALVE w/FLGS	\$932	700-4BXH	PISTON	\$486
322	LOCK NUT	\$5	600D3-2	INNER CHECK VALVE	\$741	700-4BXS	PISTON	\$371
324	LOCK NUT	-	600D3XT	CHECK VALVE	\$1,188	700-4BXT	PISTON	\$761
324S	LOCK NUT		601AJ	SNAP RING	\$20	700-4JRH	PISTON	\$258
325	CAP SCREW	\$6	601B	STEM	\$356	700-4JRSS	PISTON	\$322
325WCB	CAP SCREW		601BJ	SNAP RING	\$24	700-43R33	PISTON	\$138
326	GASKET		601DJ	SNAP RING	\$41	700-43KX 700-4X	PISTON	\$138
326KZ			601J	SNAP RING		700-4X 700-4XH	PISTON	\$130
	GASKET	\$18			\$17			•
326Y	GASKET	\$11	601JR	SNAP RING	\$12	700-4XT	PISTON	\$277
326YA	GASKET	\$17	602A	BACK PLATE	\$193	700-7	FLUSH PLUG	\$38
327P	STEM	\$129	602AJ	BACK PLATE	\$45	700-7AQ	FLUSH PLUG	\$138
328E	GLAND	\$95	602AK	GUIDE PIECE	\$149	700-7AX	FLUSH PLUG	\$59
329	STOP	i i	602BJ	BACK PLATE	\$214	700-7AXH	METERING PLUG	\$161
331-15	FLOAT	\$629	602DJ	BACK PLATE	\$298	700-7AXS	FLUSH PLUG	\$72
331-15F	FLOAT	\$657	602K	GUIDE PIECE	\$128	700-7AXT	FLUSH PLUG	\$138
333	PIPE PLUG	\$8	603AJ	TEFLON RING	\$47	700-7BX	FLUSH PLUG	\$200
334CB	CONNECTOR	\$65	603BJ	TEFLON RING	\$65	700-7BXH	METERING PLUG	\$256
343	FLOAT ROD	\$38	603DJ	TEFLON RING	\$98	700-7BXS	FLUSH PLUG	\$200
343A	FLOAT ROD	\$20	603J	TEFLON RING	\$38	700-7H	METERING PLUG	\$161
343AZ	FLOAT ROD	\$81	603JR	TEFLON RING	\$21	700-7JR	FLUSH PLUG	\$33
343CP	FLOAT ROD	\$65	604	VALVE PIECE	\$128	700-7JRH	METERING PLUG	\$123
343D	FLOAT ROD	\$41	604A	VALVE PIECE	\$185	700-7JRS	FLUSH PLUG	\$105
343H	FLOAT ROD	\$65	604AJ	VALVE PIECE	\$152	700-7S	FLUSH PLUG	\$108
343WA	FLOAT ROD	\$124	604B	VALVE PIECE	\$424	700-7T	FLUSH PLUG	\$92
343WCB	FLOAT ROD	\$15	604BJ	VALVE PIECE	\$394	702APN	BONNET	\$935
355	CARTRIDGE	\$826	604DJ	VALVE PIECE	\$641	702AS	BONNET	\$248
356	SPRING	\$8	604J	VALVE PIECE	\$90	702BPN	BONNET	\$1,545
357	ADJUSTING SCREW	\$15	604JR	VALVE PIECE	\$62	702BS	BONNET	\$455
358	PUSHER	\$90	605A1	SPRING	\$18	702BT	BONNET	\$406
		\$6	605A4	SPRING	\$17	702BXS		\$481
359	PLUG	\$87	605AJ	SPRING	\$17		BONNET	\$138
363						702JRS	BONNET	
363-510CAP	STRAINER CAP	\$99	605B	SPRING	\$39	702S	BONNET	\$138
363P	STRAINER CAP	\$96	605BJ	SPRING	\$37	702T	BONNET	\$199
364	GASKET	\$17	605BJS	SPRING	\$48	703	SEAT DISC	\$21
365	GASKET	\$6	605DJ	SPRING	\$47	703A	SEAT DISC	\$32
369	ADJUSTING SCREW		605DJS	SPRING	\$90	703B	SEAT DISC	\$54
369A	STOP SCREW		605JR	SPRING		703JR	SEAT DISC	\$21
370A	FLOAT		608AJ	BACK PLATE RING		703JRN	SEAT DISC	\$32
370M	FLOAT		608BJ	BACK PLATE RING	\$53	703BXS	SEAT DISC	\$185
370MF	FLOAT	\$364	608DJ	BACK PLATE RING		704	PISTON	\$236
377	STEM	\$59	608J	BACK PLATE RING	\$36	704A	PISTON	\$309
398A	CHAMBER	\$1,257	608JR	BACK PLATE RING	\$23	704B	PISTON	\$680
398B	CHAMBER	\$1,257	610B	RETAINER	\$75	704JR	PISTON	\$216
403S	NEEDLE	\$38	626	GASKET	\$4	705	SPRING	\$19
411	LEVER PIN	\$17	700-2	BONNET	\$110	705-1L	SPRING	\$20
411&SPACERS	LEVER PIN	\$23	700-2A	BONNET	\$174	705-5L	SPRING	\$20
411-S	LEVER PIN	\$42	700-2AP	BONNET	\$515	705-10L	SPRING	\$20
431	LINK	\$9	700-2AT	BONNET	\$248	705-20L	SPRING	\$20
431AY	LINK		700-2B	BONNET		705-35L	SPRING	\$20
477K	SPRING		700-2BP	BONNET	\$290	705-35R	SPRING	\$20
477-1	SPRING		700-2Bi	SEAT DISC	\$221	705-35K 705-45L	USE 705-50L	\$20
506	GASKET		700-3A 700-3AX	SEAT DISC	\$33		SPRING	\$20
	SPRING		700-3AX 700-3B				SPRING	
515				SEAT DISC		705-60L		\$20
516	SPRING CONE		700-3BX	SEAT DISC		705-60R	SPRING	\$20
516P	SPRING GUIDE		700-3X	SEAT DISC	\$23	705-70L	SPRING	\$20
		E1/12	700-4AP	PISTON	\$281	705-90L	SPRING	\$20
517	SCREEN							
517 517JRP 558	SCREEN SCREEN	\$128	700-4AX 700-4AXH	PISTON PISTON	\$202	705-130L 705A	SPRING SPRING	\$20 \$42

				PLACEMENT PAR			D=005:	
PART NO.	DESCRIPTION	LIST PRICE	PART NO.	DESCRIPTION	LIST PRICE	PART NO.	DESCRIPTION	LIST PRICE
705A-2L	SPRING	\$42	726	BOLT	\$10	2223W	THROAT	\$73
705A-10L	SPRING	\$42	726B	BOLT	\$9	2256WA	NOZZLE	\$45
705A-20L	SPRING	\$42	726C	BOLT	\$9	3000AN	BONNET ASSY	\$1,07
705A-30L	SPRING	\$42	726D	BOLT	\$13	3002	BONNET	\$15
705A-60L	SPRING	\$42	726E	BOLT	\$17	3002A	BONNET	\$20
705A-110L	SPRING	\$42	728	GASKET	\$5	3002AN	BONNET	\$92
705A-165L	SPRING	\$42	752AQ	SLEEVE	\$685	3002JR	BONNET	\$16
705A-114	SPRING	\$42	754AQ	PISTON	\$426	3002JRN	BONNET	\$118
705A-171	SPRING	\$42	775	PACKING RING	\$11	3002NR	BONNET	\$452
705A-270	SPRING	\$42	776	RETAINER	\$11	3003	SEAT DISC	\$29
705AL	SPRING	\$20	777BN	PACKING RING	\$15	3003A	SEAT DISC	\$3
705B-3L	SPRING	\$124	1100AH	HOUSING	\$163	3003B	SEAT DISC	\$5
705B-10L	SPRING	\$124	1100ATH	HOUSING	\$167	3003JR	SEAT DISC	\$2
705B-15X	SPRING	\$124	1100CH	HOUSING	\$136	3004	PISTON	\$13
705B-30L	SPRING	\$124	1100H	HOUSING	\$115	3004A	PISTON	\$22
705B-60L	SPRING	\$124	1100LCH	HOUSING	\$183	3004B	PISTON	\$32
705B-100L	SPRING	\$124	1100LH	HOUSING	\$176		PISTON	\$210
705B-160L	SPRING	\$124	1100LSH	HOUSING	\$347	3006	SEAT	\$5
705B-100L	SPRING	\$124	1100ESH	HOUSING	\$251	3006A	SEAT	\$9
705L	SPRING	\$124	1100SCH	HOUSING	\$231	3006B	SEAT	\$11
706-9/16"	SEAT	\$90	11003H	HOUSING	\$187	3006JR	SEAT	\$5
706-9/16		\$90	11001H 1100VH	HOUSING	• -		GASKET	-
	SEAT	• • • • • • • • • • • • • • • • • • • •			\$319	3010		\$
706A-23/32"	SEAT	\$110	1101	LENS - CLEAR	\$84	3010AN	GASKET	\$1
706A-7/8"	SEAT	\$110	1101B	BLANKING LENS	\$45	3010JR	GASKET	\$1
706B	SEAT	\$158	1101R	LENS - REFLEX	\$67	3010N	GASKET	\$
706JR-3/8"	SEAT	\$90	1102SH	RETAINER SS HEX	\$115		PUSH ROD	\$8
706JR-9/16"	SEAT	\$90	1103	GASKET	\$8	3012B	PUSH ROD	\$90
706JRP	SEAT	\$60	1103T	GASKET - TEFLON	\$48	3012JRL	PUSH ROD	\$50
707-9/16"	METERING PLUG	\$81	1104	GASKET	\$5	3012L	PUSH ROD	\$50
707-23/32"	METERING PLUG	\$81	1105	FROST SHIELD	\$57	3013	NUT	\$6
707A-23/32"	METERING PLUG	\$102	1105L	FROST SHIELD	\$73	3013JR	NUT	\$6
707A-7/8"	METERING PLUG	\$102	1105/1106	FRST SHLD/O-RING	\$60	3014	TUBE ASSY	\$10
707B	METERING PLUG	\$236	1105L/1106	FRST SHLD/O-RING	\$77	3014A	TUBE ASS'Y	\$10
707JR-3/8"	METERING PLUG	\$98	1106	O-RING	\$5	3014TF	TUBE FITTING	\$4
707JR-9/16"	METERING PLUG	\$98	1358	GASKET	\$11	3017NR	STEM	\$5
708A	SPRING CONE	\$56	1458	GASKET	\$21	3333NR	PLUG	\$4
708AT	SPRING CONE	\$62	1459	BOLT	\$5	5000-131	SNAP RING	\$
708B	SPRING CONE	\$56	2026SL	NOZZLE	\$268	5000-175	SNAP RING	\$12
708BT	SPRING CONE	\$185	2027SL	THROAT	\$159	5108-137	SNAP RING	\$9
708BXT	SPRING CONE	\$200	2028SL	NUT	\$56	5108-177	SNAP RING	\$14
710	GASKET	\$6	2029	GASKET	\$4	B-10985	CHAMBER	\$1,39
710A	GASKET	\$8	2030SL	NUT	\$58	RHR120	DELAY RLY 120V	\$39
710B	GASKET		2046SL	NOZZLE		RHR240	DELAY RLY 240V	\$39
710JR	GASKET		2047SL	THROAT		TBASE	OCTAL BASE	\$12
711	STEM		2048	NUT		THR120	TIMER ASSY 120V	\$52
711A	STEM		2049	GASKET		THR240	TIMER ASSY 240V	\$52
711A 711AXT	STEM		2049 2076W	FRONT PIECE		U4-1	NUT	\$6
711B	STEM		2076W 2077W	THROAT	•	U4-1S	NUT	
								\$6
711BT	STEM		2077W-BL	THROAT BLANK		U4-3S	RETAINER	\$4
711X	STEM		2101W	FRONT PIECE		U4-4	GASKET	\$
711XS	STEM		2106SL	NOZZLE		U6-1S	NUT	\$8
′11XT	STEM		2107SL	THROAT		U6-4	GASKET	\$
714	SEAL CAP		2107W	THROAT	\$268			
'14N	SEAL CAP		2108SL	NUT	\$91			
714B	SEAL CAP	\$180	2110SL	CONNECTOR	\$61	1		
718	CAP SCREW	\$5	2111	GASKET	\$5	]		
720	GASKET	\$8	2125WA-3	INJ. WELDMENT	\$358			
720B	GASKET	\$8	2126	NOZZLE	\$384			
'21A	BOLT	\$4	2127WA	THROAT	\$221	1		
'21L	BOLT	\$5	2130	NUT	\$51	1		
<b>7</b> 23	GASKET	\$6	2131B	CONNECTOR	\$30	1		
725	GASKET		2157\\/\	THROAT	\$178	1		

\$178 \$486

THROAT NOZZLE

\$8 2157WA \$11 2222

725 725N GASKET GASKET

#### RETURN MATERIAL AUTHORIZATION POLICY

#### FOR PRODUCTS MANUFACTURED BY H. A. PHILLIPS & CO.:

H. A. Phillips & Co. will review any customer's request to return product(s) for credit or repair. Customers must obtain a Return Material Authorization prior to returning any product(s). NOTE: RMA numbers are only valid for 6 months following their date of issue.

#### The following steps must be followed for all returns and repairs:

- 1. Customer contacts H. A. Phillips & Co. for a Return Material Authorization (RMA) number.
- 2. H. A. Phillips & Co. issues the customer and RMA form and a copy of the Return Material and Repair Policy.
- 3. H. A. Phillips & Co. indicates "Repair & Return" or "Return for Credit" on the RMA form.
- 4. Customer includes the RMA form with the product(s) when packaged for shipment.
- 5. Customer writes the RMA number on the outside of the package.
- 6. The product(s) must be packaged properly to prevent any damage during shipment. The original box must be used for all returns except valid warranty claims.
- 7. Customer ships the product(s) prepaid UPS to the factory address. H. A. Phillips & Co. WILL NOT accept any C.O.D. parcels.
- 8. Payment for product is not contingent upon processing of RMA. Any applicable credit(s) will be available only upon issuance by H. A. Phillips. Please refer to the published Terms & Conditions regarding payment terms.

#### Returns:

When a credit is requested, H. A. Phillips & Co. will inspect the returned condition of the product(s) prior to making a credit decision. A minimum restocking charge calculated as 15% of the purchase price or \$15.00, whichever is greater, will apply. If the product(s) returned is (are) a non-stocked assembly that must be disassembled before restocking the components, a restocking charge of 25% of the purchase price or \$25.00, whichever is greater, will apply. If the returned product(s) is (are) defective in material or workmanship according to the warranty provisions of H. A. Phillips & Co.'s Terms & Conditions of Sale, there will be no restocking charge. An additional charge of 10% of the purchase price or \$10.00, whichever is greater, will apply if the product is returned without: 1) the original packaging (for non-warranty returns only), 2) the RMA paperwork, or 3) if the RMA is more than 60 days old on the date that the product was shipped to the factory by the customer.

Any damage due to improper packing of the returned product(s) by the customer will be charged to the customer or the product(s) will be returned to the customer with no credit given and return freight billed to the customer.

#### Repairs:

H. A. Phillips & Co. will repair valves with a Valve Serial Number that indicates the valve was manufactured less than ten (10) years prior to the request for an RMA. A customer should check with the factory to verify the age. Repair parts for older valves are usually available. H. A. Phillips & Co. will repair a valve for a fee of 75% of the current total cost for a new valve, contingent on the re-use of the valve body and float ball (if applicable). The repaired or replaced valve assumes the remaining term of the applicable warranty or 90 days; whichever is longer. FOR PRODUCTS SOLD OR DISTRIBUTED BY H. A. PHILLIPS & CO. BUT MANUFACTURED BY OTHERS:

#### Returns:

When a credit is requested for product(s) not manufactured by H. A. Phillips & Co., any restocking fee(s) is (are) subject to the published Terms & Conditions of the original manufacturer. The restock fee(s) and other costs related to the credit request will be passed to the customer.

#### LIMITED PRODUCT WARRANTY

Seller warrants that its products ("Product(s)") will meet the specifications set forth in its catalog from time to time, unless the Buyer is notified otherwise prior to delivery. Seller will, without charge, repair or provide a replacement for any of the Products which prove to be defective in materials or workmanship within one (1) year from the date of shipment ("Warranty Period").

If, within the Warranty Period, Buyer discovers a defect in materials or workmanship, which interferes with the operation of any Product, Buyer must promptly notify Seller, in writing, of such defect. Seller's sole obligation to Buyer under this Warranty is to repair and correct any defect in material or workmanship, or provide a replacement Product to Buyer. Seller's decision with respect to the applicability of this Warranty to any defect shall be final and conclusive. Seller reserves the right to require Buyer, at Buyer's sole cost and expense, to return any defective Product, including any alterations made thereto, F.O.B. Seller's factory in Illinois.

Seller does not warrant against abrasion, corrosion or erosion. Seller shall not be liable to Buyer or to any other person for work done or repairs made, to remedy any defect, by any person who is not an authorized representative of Seller, unless Seller's written consent is first obtained by Buyer. This Warranty does not apply to, and is rendered null and void by, any Product which, after leaving Seller's manufacturing plant: (a) is repaired or altered without Seller's prior written approval; (b) is the subject of improper storage, installation or operation; (c) is the subject of intentional or negligent misuse, misapplication, neglect or accident; or (d) is not used, repaired or altered in accordance with Seller's written instructions

This Warranty does not apply to any products which are purchased and resold by Seller and which bear the original manufacturer's name or nameplate on the product. Any such products shall be warranted only to the extent of the express warranty, if any, provided by the manufacturer of such products or parts as published in their Terms and Conditions.

Seller expressly reserves the right to declare this Warranty null and void upon Buyer's failure to make full and timely payments with respect to any Products purchased by Buyer from Seller, in which event all of Seller's obligations, and Buyer's rights, under this Warranty, shall immediately terminate.

SELLER DISCLAIMS THE IMPLIED WARRANTY OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, AND ANY IMPLIED WARRANTIES ARISING FROM COURSE OF PERFORMANCE, COURSE OF DEALING, OR USAGE OF TRADE. SELLER SHALL NOT BE LIABLE TO BUYER OR ANY OTHER PARTY UNDER THIS WARRANTY FOR DIRECT, SPECIAL, CONSEQUENTIAL, INDIRECT OR INCIDENTAL DAMAGES OF ANY KIND.

#### TERMS AND CONDITIONS OF SALE

- 1. Acceptance of Orders. All sales made by H.A. Phillips & Co. ("Seller") of its products ("Products") are contingent upon the Buyer's acceptance of these Terms and Conditions of Sale ("Terms"). All orders placed by Buyer are subject to acceptance by an authorized representative of Seller at Seller's principal offices in Illinois. Any terms and conditions contained in Buyer's purchase order which are inconsistent with, or in addition to, these Terms, shall not be binding upon Seller unless, and until, Seller agrees to any such terms and conditions, in writing, signed by an authorized representative of Seller. These Terms cannot be modified or waived except by written agreement executed by an authorized representative of Seller at Seller's principal offices in Illinois.
- 2. Prices. Prices stated in Seller's price list are subject to change without notice. Prices listed in Seller's quotations or acknowledgements, or which are quoted verbally (other than welded products for which only a written quotation is valid) by Seller, shall remain firm for thirty (30) days unless Seller notifies Buyer to the contrary.
- 3. Payment Terms. Provided that Buyer has established a credit account with Seller, then payment terms for all Products for US Customers with a selling price less than \$50,000.00 and Canadian Customers with a selling price less than \$25,000.00, are net cash (U.S. Dollars) thirty (30) days from date of invoice (date of shipment). For all Products for US Customers with a selling price greater than \$50,000.00, 10% of the selling price is due prior to the time that the order is shipped, with the remaining 90% due net cash (U.S. Dollars) thirty (30) days from date of invoice (date of shipment). For all Products for Canadian Customers with a selling price greater than \$25,000.00, 25% of the selling price is due prior to the time that the order is shipped, with the remaining 75% due net cash (U.S. Dollars) thirty (30) days from the date of invoice (date of shipment). If Buyer has not established a credit account with Seller, then payment terms for all Products are net cash (U.S. Dollars) prior to shipment. Certain credit cards may be accepted for payment, but only prior to the time that an order is shipped. Credit cards will not be accepted after the time that an order is shipped. These payment terms are independent of, and are not contingent upon, the time and manner in which Buyer receives payment from any of its customers. All Sales Orders are quoted by Seller to Customers as cash (U.S. Dollars) sale. An additional 2% is added to all Welded Products orders when paid by credit card. A finance charge of 1.5% per month (annual percentage rate of 18%) will be charged on all past due amounts. In the event suit or other proceeding is brought by Seller for the recovery of the purchase price, or any unpaid portion thereof, or for any breach of any of these Terms, Buyer shall pay to Seller, including reasonable attorney fees, and Seller shall be entitled to have such costs and fees included as part of any judgment obtained by Seller.
- 4. Taxes. Prices set forth in Seller's price list, or quoted by Seller, do not include applicable federal, state or local taxes or other charges. Buyer shall pay all such taxes and other charges, together with any penalties and interest, and file any returns with respect thereto, upon receipt of any invoice from Seller. In lieu of payment of any such taxes, Buyer shall provide Seller with an acceptable tax exemption certificate. Buyer agrees to indemnify Seller, and hold Seller harmless, and upon request, defend Seller, against any and all assessments, demands, causes of action, suits, or claims of any nature, whatsoever, including costs and attorney fees, incurred by Seller in connection with the payment or nonpayment of any applicable taxes, for the filing or failure to file any returns, which are required of Buyer by law or pursuant to this paragraph 4.
- 5. <u>Delivery and Shipment Dates</u>. Any dates and schedules for delivery of Products stated in Seller's quotation or acknowledgement represent Seller's best estimate made at the time of such quotation or acknowledgement, and are not binding upon Seller. Seller reserves the right to make deliveries in installments and to separately invoice Buyer for each installment. Seller shall have no liability, whatsoever, to Buyer, Buyer's customers, or any third party for direct, liquidated, consequential, incidental or indirect damages, losses or expenses resulting from delays in shipment of any Products or installments of Products.
- 6. Freight. All shipments are F.O.B., Seller's factory in Illinois. If Buyer specified shipment by "Pre-paid Freight", freight charges plus 10% (15% for same-day shipments), but not less than \$5.00 in any case, will be added to Buyer's invoice. If Buyer specified shipment by "Collect" or "Third Party", a \$5.00 handling charge per order will be added to Buyer's invoice. Any domestic orders placed after 2pm Central Time (12 noon for International orders) requiring same-day assembly will be charged a \$25 fee per item. Any domestic non-assembly orders placed after 3pm Central Time (2pm for International orders) requiring same-day shipping will be charged a \$25 fee per order. International orders placed after 3pm Central Time cannot be guaranteed for same-day shipping.
- 7. Security. Seller shall have, and Buyer hereby grants to Seller, a security interest in all Products sold to Buyer until full and complete payment has been received by Seller from Buyer for the Products. Buyer agrees to do all acts necessary to permit Seller to perfect and maintain such security interest.
- 8. Returns. Seller will review Buyer's request to return standard Products for credit or repair. Prior to returning any standard Product, Buyer must obtain Return Material Authorization from Seller. Except for valid warranty claims, no returns will be accepted after 90 days from the date of shipment. A minimum restocking charge will be charged on all non-warranty returns. All Resale items are subject to the Terms and Conditions as published by the original manufacturer. A copy of Seller's Return Material and Repair Policy is available upon request.
- 9. <u>Indemnification</u>. Buyer shall indemnify and defend Seller, and hold Seller harmless, from and against any and all claims, demands, causes of action, loss, or damage, including reasonable attorney fees, arising from or relating to the improper use or installation of any Product or any acts or omissions of Buyer.
- 10. <u>Limitation of Liability</u>. IN NO EVENT SHALL SELLER HAVE ANY LIABILITY, WHATSOEVER, TO BUYER, BUYER'S CUSTOMERS, OR ANY THIRD PARTY FOR SPECIAL, LIQUIDATED, CONSEQUENTIAL, INCIDENTAL OR INDIRECT LOSS OR DAMAGE OF ANY KIND, ARISING OUT OF, OR ALLEGED TO ARISE OUT OF, ANY PRODUCTS OR SELLER'S SALE THEREOF. SELLER'S LIABILITY FOR WARRANTY CLAIMS IS SOLELY AS SET FORTH IN SELLER'S LIMITED PRODUCT WARRANTY AS PROVIDED IN PARAGRAPH 11 OF THESE TERMS.
- 11. Warranty. Seller warrants its Products in accordance with Seller's Limited Product Warranty, a copy of which Buyer acknowledges receipt with these Terms, and which is incorporated herein by reference. SELLER DISCLAIMS THE IMPLIED WARRANTY OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, AND ANY IMPLIED WARRANTIES ARISING FROM COURSE OF PERFORMANCE, COURSE OF DEALING, OR USAGE OF TRADE. SELLER SHALL NOT BE LIABLE TO BUYER OR ANY OTHER PARTY UNDER THIS WARRANTY FOR DIRECT, SPECIAL, CONSEQUENTIAL, INDIRECT OR INCIDENTAL DAMAGES OF ANY KIND.
- 12. Cancellation. No order for Products may be cancelled by Buyer without the prior written consent of Seller. In the event Seller consents to cancellation of any order placed by Buyer, Buyer agrees to reimburse Seller for any expenses incurred in developing, engineering, or manufacturing any Products to Buyer's specifications and for any Products shipped to Buyer prior to Seller's receipt of any notice of cancellation.
- 13. Choice of Law. All agreements between Seller and Buyer with respect to any Products, or the performance thereof, shall be construed in accordance with, and governed by, the laws of the State of Illinois.
- 14. <u>Jurisdiction</u>. Seller and Buyer hereby acknowledge and agree that this sale is entered into in DeKalb County, Illinois, and hereby further agree to submit themselves to the jurisdiction of the courts of DeKalb County, Illinois, with respect to any claim, controversy or dispute, whether in law or in equity, which arises from, or is alleged to arise from, or is in any way related to, this sale.
- 15. Waiver. Waiver by Seller of Buyer's breach of any of these Terms shall not be construed as a waiver of any other breach.
- 16. Severability. In the event any provision of these Terms shall be declared invalid or unenforceable by a court of competent jurisdiction, the remaining provisions of these Terms shall remain in full force and effect.