

WIDDER TOOLS



HPIH-3000 Hand Pump



PRODUCT INFORMATION AND OPERATING INSTRUCTIONS:

Description: The **HPIH-3000** Hand Pump is a portable, manually operated hydrostatic test system. The aluminum base with convenient built-in handle creates a light weight and compact unit, while retaining ruggedness and durability. This unit comes standard with a relief valve and stainless-steel check valve for solid performance.

Specifications:	Weight	17 lbs.
	Pump Ratio	60:1
	Max. Output Pressure	3,020 PSI (75 lbs. handle load)
	Displacement / Stroke	0.360 cu. in.
	Max. Flow Rate	3.5 GPM w/ 60 PSI inlet pres.
	Fluid Inlet	1/2" NPT Female
	Fluid Outlet	1/2" NPT Female

**IMPORTANT: READ MANUAL CAREFULLY BEFORE OPERATING THIS TOOL.
FOLLOW ALL SAFETY PRECAUTIONS LISTED AND ALL OSHA REGULATIONS
PERTAINING TO THIS TOOL.**

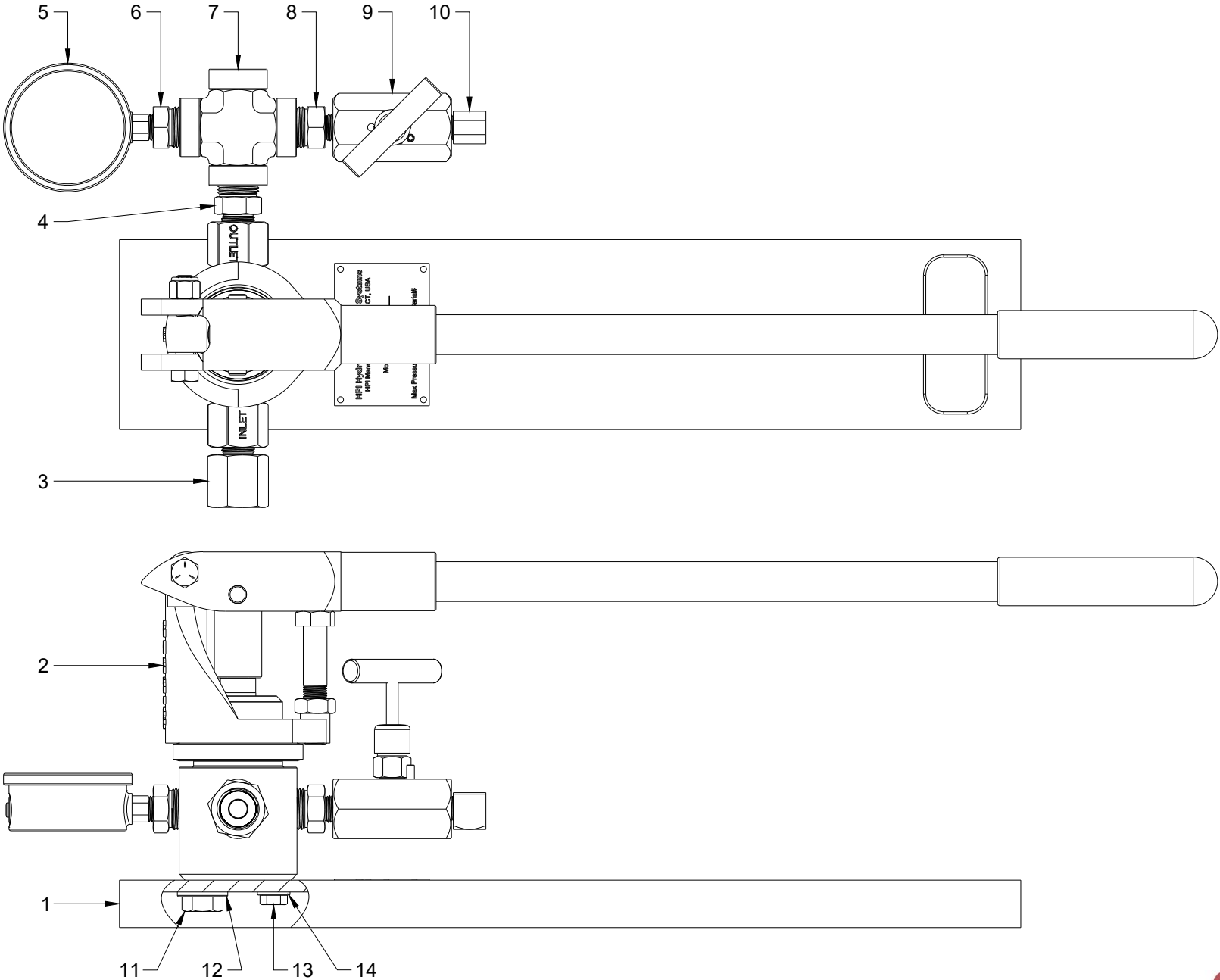
SAFETY PRECAUTIONS:

1. Be sure all pressure on air and water fittings is relieved before disconnecting any hoses or fittings.
2. Wear eye protection.
3. Pressurization of any materials is dangerous- follow OSHA procedures for stored energy and any pressurization cautions pertaining to the fluids used.
4. This system can develop pressure up to the nameplate pressure- do not over pressure test vessels as damage can occur.

OPERATING INSTRUCTIONS:

1. Close Bleed Valve.
2. Attach water supply to inlet side with supply off.
3. Attach outlet side to vessel using suitable hose.
4. Fill vessel to be tested by opening water supply
5. When vessel is full, lift pump handle completely and crack needle valve to bleed any air
6. Once air is bled from the system, firmly close needle valve.
7. Pump unit to desired test pressure **** Do not exceed pump rated pressure!**
8. When test is complete, close inlet water supply, then crack needle valve to relieve system pressure.
9. Disconnect hoses from inlet and outlet sides of pump.

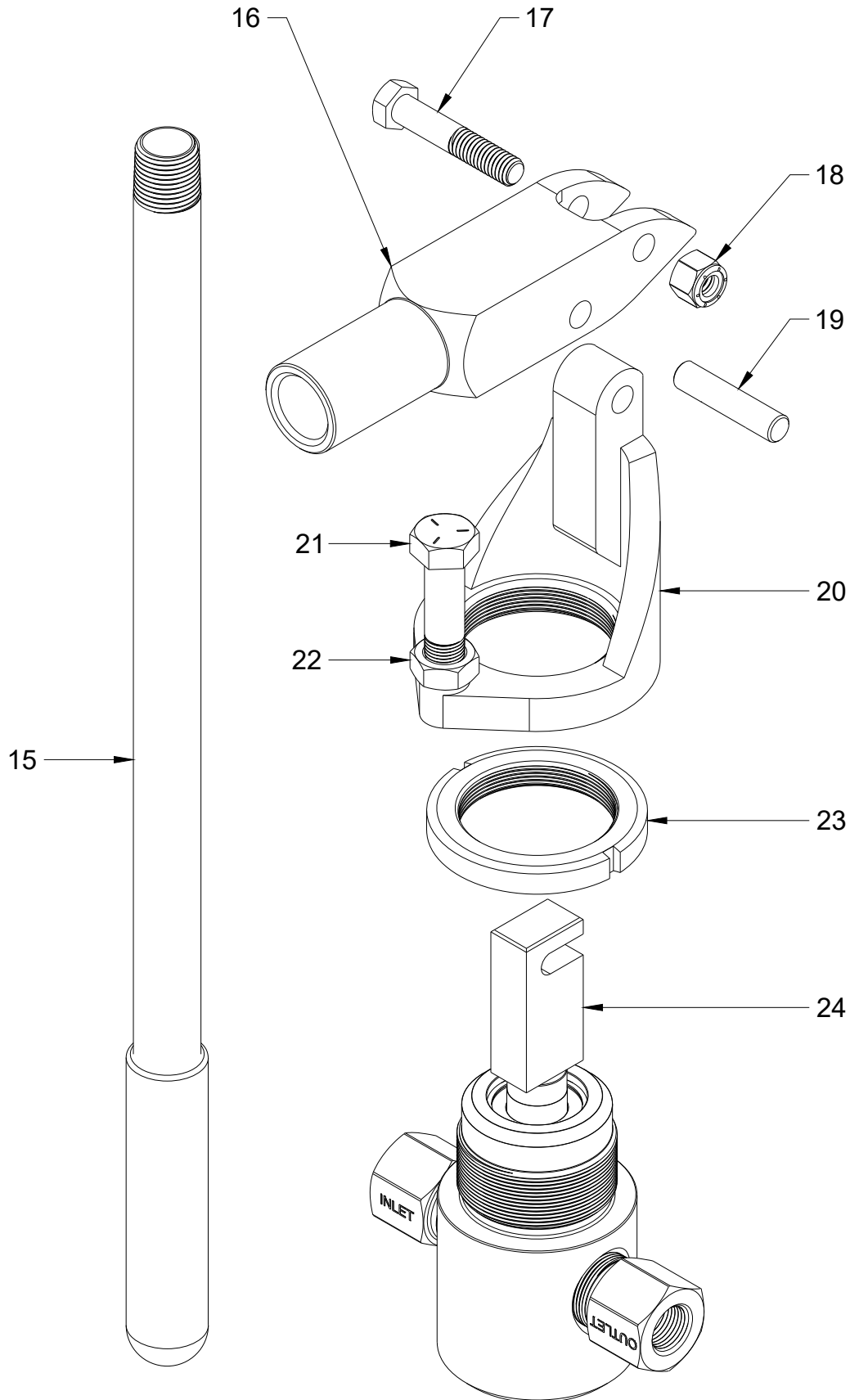
HPIH-3000 Hydrostatic Test Pump



HPIH-3000 Hydrostatic Test Pump

Item	Part #	Description
1	PH-1001	Base
2	PH-1002-060	Pump
3	PH-1010	Inlet Adapter
4	PH-1016	Outlet Adapter
5	PH-1003-3000	Gauge
6	PH-1005	Gauge Adapter
7	PH-1011	Cross
8	PH-1015	Valve Adapter
9	PMI028	Bleed Valve
10	PMI048	Elbow
11	PH-1006	Hex Bolt (Large)
12	PH-1007	Washer (Large)
13	PH-1008	Hex Bolt (Small)
14	PH-1009	Washer (Small)

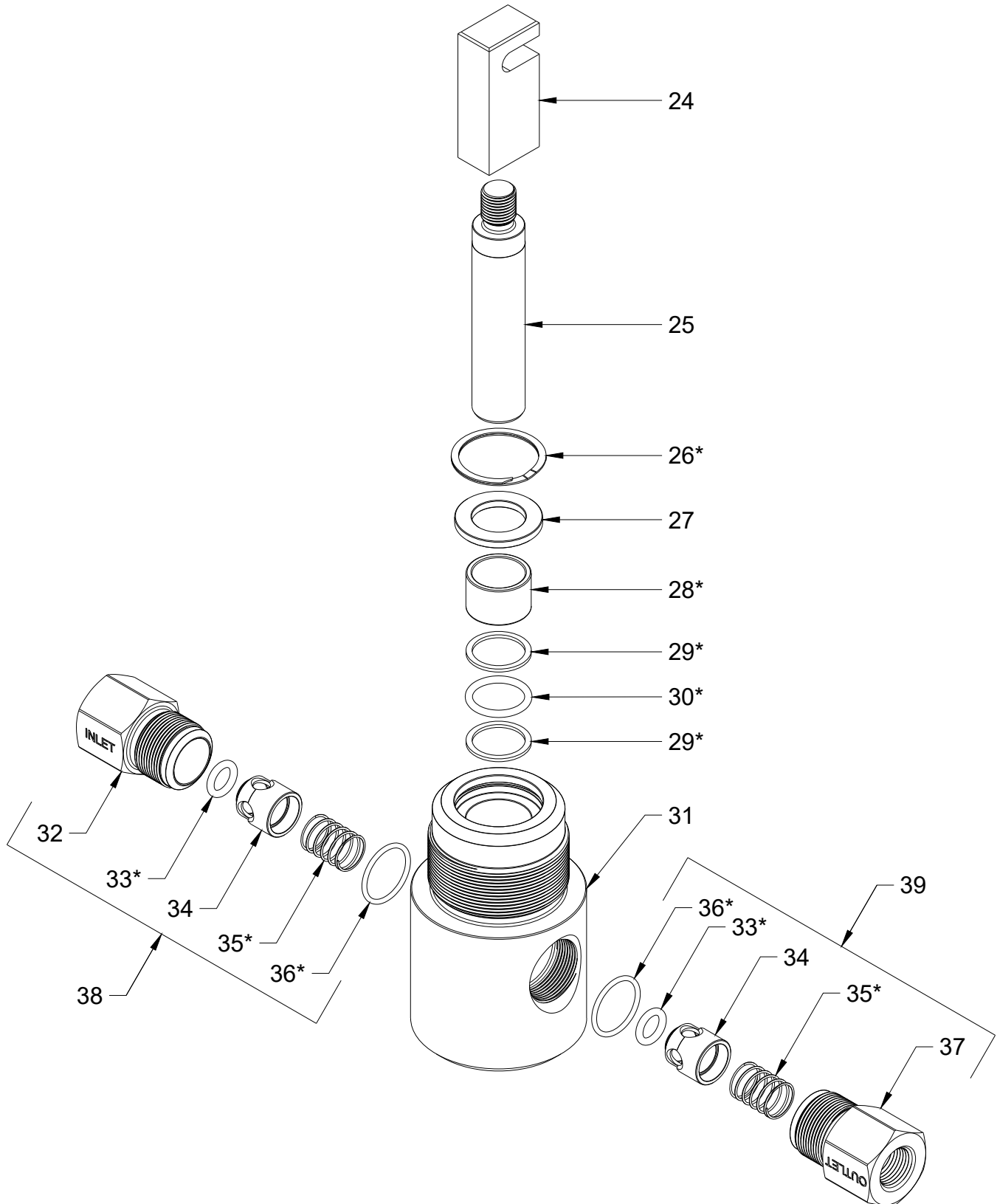
PH-1002-060 Pump - External



PH-1002-060 Pump - External

Item	Part #	Description
15	PH-1021	Handle
16	PH-2014	Handle Mount
17	PH-2012	Bolt, Handle Pivot
18	PH-2013	Nut, Handle Pivot
19	PH-2015	Pin, Piston Adapter
20	PH-2009	Handle Pivot Bracket
21	PH-2016	Bolt, Handle Stop
22	PH-2017	Jam Nut, Handle Stop
23	PH-2010	Lock Nut, Handle Pivot Bracket
24	PH-2011	Adapter, Piston to Handle

PH-1002-060 Pump - Internal



PH-1002-060 Pump - Internal

Item	Part #	Description
24	PH-2011	Adapter, Piston to Handle
25	PH-2003-060	Piston, 60:1
26*	PH-2008	Retaining Ring
27	PH-2007-060	Seal Retainer, 60:1
28*	PH-2006-060	Piston Guide, 60:1
29*	PH-2004-060	Backup Ring, 60:1 (2 per pump)
30*	PH-2005-060	O-Ring, 60:1 Piston
31	PH-2001-060	Cylinder, 60:1
32	PH-1017-1	Body, 3/8 NPT Inlet Check Valve
33*	PH-1017-2	O-Ring, 3/8 NPT CV (2 per pump)
34	PH-1017-3	Poppet, 3/8 NPT CV (2 per pump)
35*	PH-1017-5	Spring, 3/8 NPT CV (2 per pump)
36*	PH-1017-4	O-Ring, 3/8 NPT CV (2 per pump)
37	PH-1018-1	Body, 3/8 NPT Outlet Check Valve
38	PH-1017	Inlet Check Valve, 3/8 NPT
39	PH-1018	Outlet Check Valve, 3/8 NPT
*	HPIH-3000SK	Seal Kit (includes all items marked with asterisk)