

ARIMITSU

PROVEN PLUNGER PUMPS



11 Series

Model 1110

FEATURES

- Triplex pumps provide smooth liquid flow
- Liquid cooled, low drag seals provide long life, improved suction, higher efficiency and longer dry running without damage
- Balanced flow crankcase design and precision machining ensures uniform lubrication and quiet operation
- Manifold is designed and machined to guarantee superior fluid flow
- Zero-clearance exclusionary seals protect crankcase

QUALITY

- 100% stainless steel valve assemblies deliver greater temperature and chemical handling abilities
- Precision ground ceramic plungers utilize a proprietary material blend for long life and increased thermal shock resistance
- Forged brass manifolds offer strength and corrosion resistance
- Proprietary, proven seal blend maximizes life and increases maintenance intervals
- Oversized crankshaft bearings for long life and quiet operation

MAINTENANCE

- No special tools required for repair or maintenance
- Fluid end is easily serviced without entering crankcase
- Seals require no adjustment

SPECIFICATIONS

Model 1110	US	METRIC
Flow	23 gpm	87 lpm
Pressure	1000 psi	70 bar
RPM	950	950
Inlet Pressure	Flooded to 70 psi	Flooded to 5 bar
Alternative specification		
Flow	16 gpm	60 lpm
Pressure	1500 psi	105 bar
RPM	650	650
Inlet Pressure	-5 o 70 psi	0-5 bar
Inlet	1-1/4" MNPT	1-1/4" MNPT
Outlet	1" & 3/4"	1" & 3/4"
Oil requirement	60 oz.	1.8 L
Shaft Dia.	1.5"	38 mm
Max Liquid Temp.	175°F	80°C
Shaft Location	both sides	both sides
Weight	86 lbs.	39 kg

Determining Pump RPM	$\frac{\text{Rated GPM}}{\text{Rated RPM}}$	=	$\frac{\text{"Desired" GPM}}{\text{"Desired" RPM}}$
Determining Required HP	$\frac{\text{GPM} \times \text{PSI}}{1460}$	=	Electric Brake H.P. Required
Determining Motor Pulley Size	$\frac{\text{Motor Pulley OD}}{\text{Pump RPM}}$	=	$\frac{\text{Pump Pulley OD}}{\text{Motor RPM}}$

Parts List

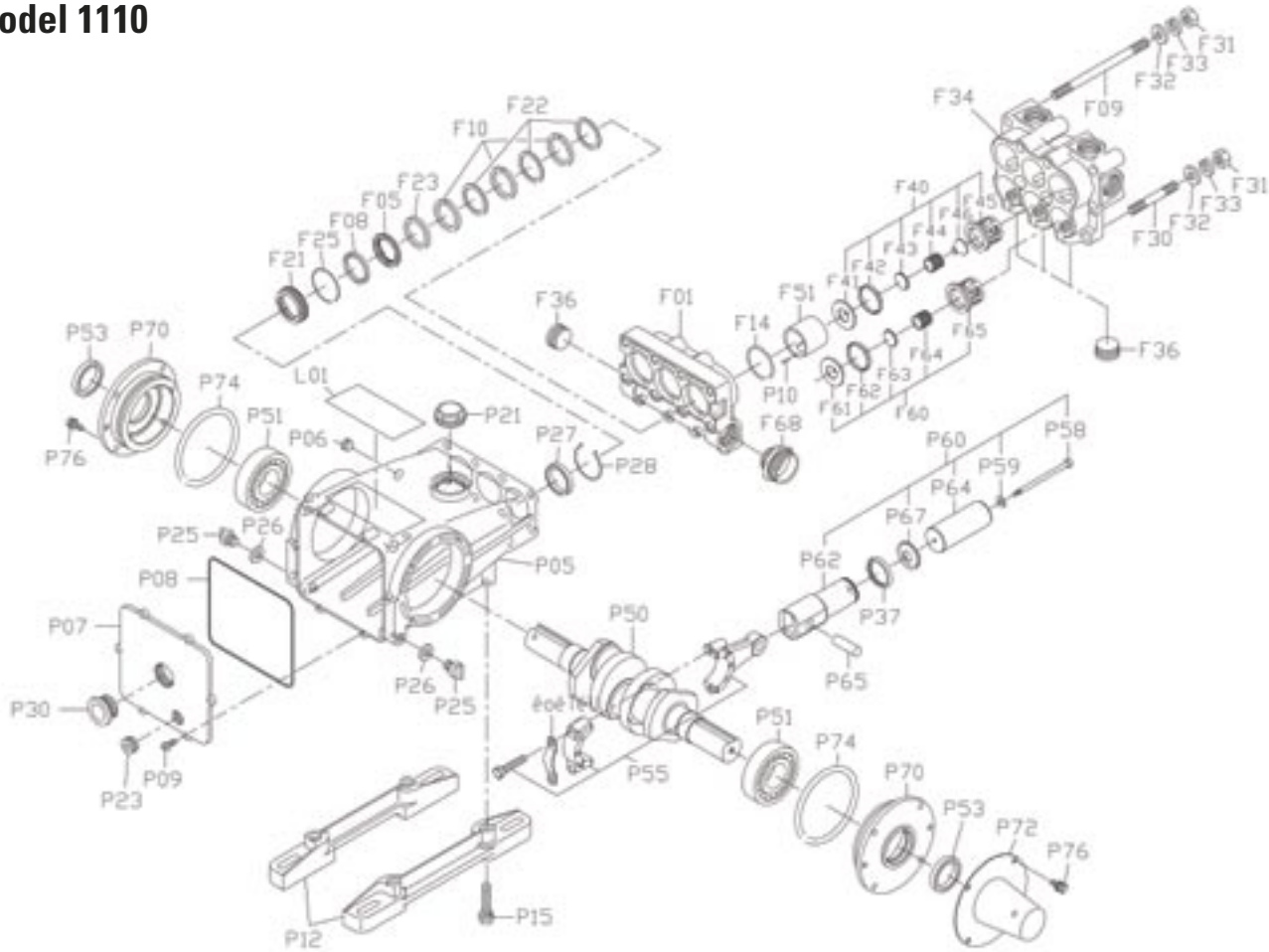
REF. #	PART NUMBER	PART NAME	MATERIAL	QTY
F01	0443001010	MANIFOLD, INLET	BRASS	1
F05	0443001200	SEAL RETAINER	BRASS	3
F08	04430014K0	VACUUM SEAL	NBR	3
F09	0440001100	STUD BOLT	PLATED STEEL	8
F10	04430014Y0	SEAL, PACKING	FPF	9
F14	9202F25045	O-RING, MANIFOLD	NBR	3
F21	0443001260	SEAL HOLDER	BRASS	3
F22	0443001270	SPACER, SEAL	FP	9
F23	0443001272	SEAL SUPPORT	FP	3
F25	9203B15050	O-RING	NBR	3
F30	0440001140	STUD BOLT	PLATED STEEL	4
F31	9140B12000	HEX NUT	PLATED STEEL	12
F32	9162B12000	WASHER	PLATED STEEL	12
F33	9163F12000	LOCK WASHER	PLATED STEEL	12
F34	0443003200	MANIFOLD, DISCHARGE	BRASS	1
F36	0440003940	PLUG	BRASS	1
F40	0443003300	VALVE ASSEMBLY, DISCHARGE		3
F41	0443003320	SEAT	STAINLESS	3
F42	0443003340	GASKET,VALVE	NBR	3
F43	0443003350	DISC	STAINLESS	3
F44	0443003370	SPRING	STAINLESS	3
F45	0449003380	CAGE	STAINLESS	3
F46	0443003390	GUIDE	BRASS	3
F51	0443003420	SLEEVE	BRASS	3
F60	0443003800	VALVE ASSEMBLY, INLET		3
F61	0443003320	SEAT	STAINLESS	3
F62	0443003340	GASKET	NBR	3
F63	0443003350	DISC	STAINLESS	3
F64	0443003370	SPRING	STAINLESS	3
F65	0449003380	CAGE	STAINLESS	3
F68	0443003910	INLET FITTING	BRASS	1
P05	0440002010	CRANKCASE	ALUMINUM	1
P06	9313A11000	PLUG	STEEL	1
P07	0440002040	BACK COVER	ALUMINUM	1
P08	0440002050	GASKET	NBR	1
P09	9130B06020	SCREW	PLATED STEEL	6
P10	0440001110	DOWEL PIN	STAINLESS	3
P12	0400002200	MOUNTING FEET	ALUMINUM	2
P15	9106B10055	BOLT	STEEL	4
P21	0589112300	OIL CAP	FP	1
P25	0090002320	DRAIN PLUG	FP	2
P26	0090002340	PLUG GASKET	NBR	2
P23	9313A11500	PLUG	STEEL	1
P27	0440002400	OIL SEAL	NBR	3
P28	0440002420	RETAINER	STAINLESS	3
P30	0440002600	SIGHT GLASS	FP	1
P37	0440001730	EXCLUSION SEAL	NBR	3
P50	0440004010	CRANKSHAFT	STEEL	1
P51	0440004020	BEARING	STEEL	2
P53	0400004030	OIL SEAL, BEARING	NBR	2
P55	0440004600	CON-ROD ASSEMBLY	ALUMINUM	3
P60	04430047S0	PLUNGER ASSEMBLY		3
P58	9120R05105	BOLT	STAINLESS	3
P59	0121114852	GASKET	COPPER	3
P62	0440004860	GUIDE ROD ASSEMBLY	STEEL/STAINLESS	3
P64	04430048S0	PLUNGER	CERAMIC	3
P65	04000049001	PLUNGER PIN	STEEL	3
P67	0443004850	SPACER	BRASS	3
P70	0440004400	BEARING COVER	ALUMINUM	2
P72	0400004430	SHAFT COVER	PLATED STEEL	1
P74	9201B50105	O-RING	NBR	2
P76	9106B08025	BOLT	STEEL	8

* Material listed may be a proprietary version. Parts names without part numbers are only available within complete assemblies.

* Material codes: FP=Flouropolymer, NBR=Medium Nitrile (Buna-N), FPF=Flouropolymer Fiber
STAINLESS=Stainless Steal (300 Series)

Exploded View

Model 1110



09/05

REF. #	PART NUMBER	PART NAME	MATERIAL	QTY
	30117	SEAL KIT, 1110 (INCLUDES F08, F10, F22, F23, F25)		1
	30118	VALVE KIT, INLET	STAINLESS	1
	30119	VALVE KIT, OUTLET	STAINLESS	1
	30103	OIL, BOTTLE (32 OZ) ISO 100		1
Recommended Accessories				
	70101	110105 REGULATOR, 30 gpm, 1500 PSI	BRONZE/STAINLESS	1

Horsepower Requirements

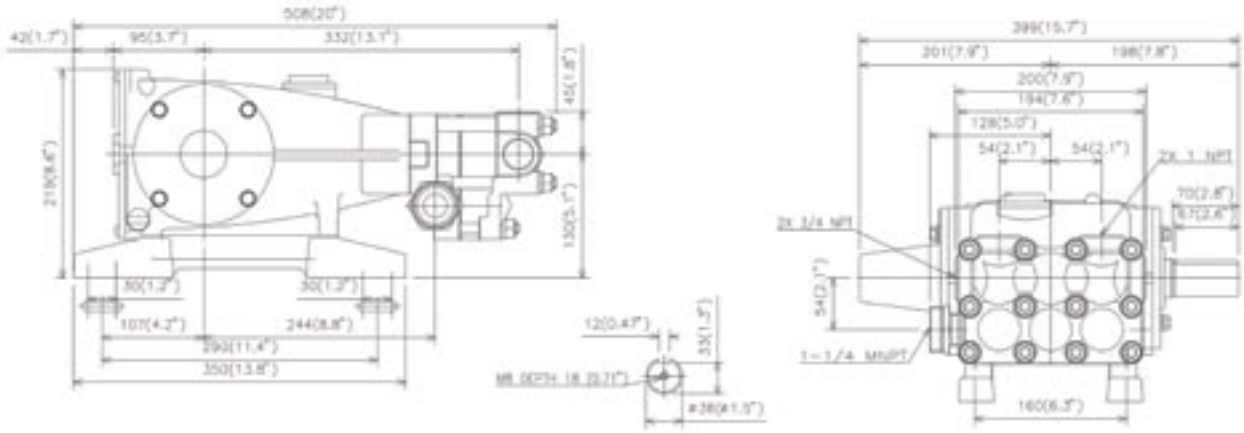
Pressure (psi)

				Pressure (psi)				
	RPM	GPM	LPM	900	1000	1100	1200	1500
1110	650	16.0	62.7	9.6	10.7	11.7	12.8	16.0
	800	19.5	77.2	11.7	13.0	14.3	15.6	
	950	23.0	91.7	13.8	15.3			

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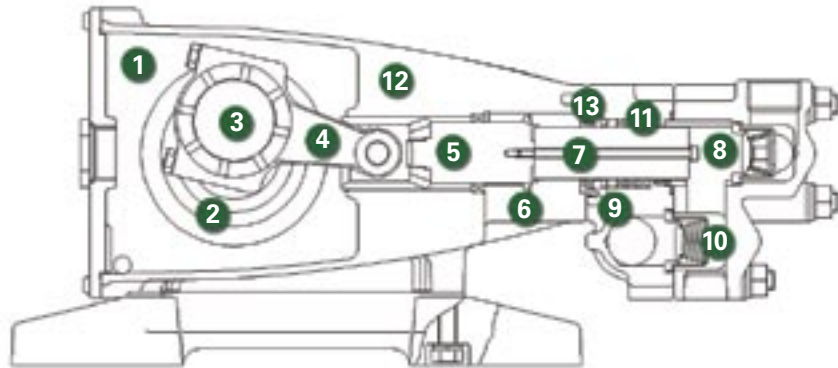
PROVEN PLUNGER PUMPS

DIMENSIONS (mm/in.)



CUTAWAY

- 1 High strength, lightweight die cast crankcase
- 2 Oversized crankshaft bearings for long life and quiet operation
- 3 Crankshaft is machined for low friction, quiet operation and high efficiency
- 4 High strength connecting rods are tolerance matched for extended life and low friction operation
- 5 High polish stainless steel plunger rods for smooth operation and even wear
- 6 Zero clearance, polymer exclusionary seal protects pump crankcase from fluid entry and will not corrode
- 7 Proprietary blend, solid ceramic plungers for long wear and increased thermal shock resistance
- 8 Forged brass manifolds for strength and corrosion resistance, machined to optimize fluid flow and performance while extending useful life
- 9 Liquid-cooled, low drag seals provide long life, extended run-dry ability and increased suction lift
- 10 100% stainless steel valve construction provides superior protection against chemical and temperature damage
- 11 Industrial, continuous-duty seal design for superior life and expanded fluid handling abilities
- 12 Balanced flow crankcase ensures lubrication and quiet operation
- 13 Slide-in seal cases mean no special tools are required, making seal replacement easy



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Manufactured by Arimitsu Industry Co., Ltd., of Osaka, Japan, a leading supplier of Industrial plunger pumps and systems used by Industrial leaders throughout the World.



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 Part #. 106