

MODEL 6821KM.CO₂



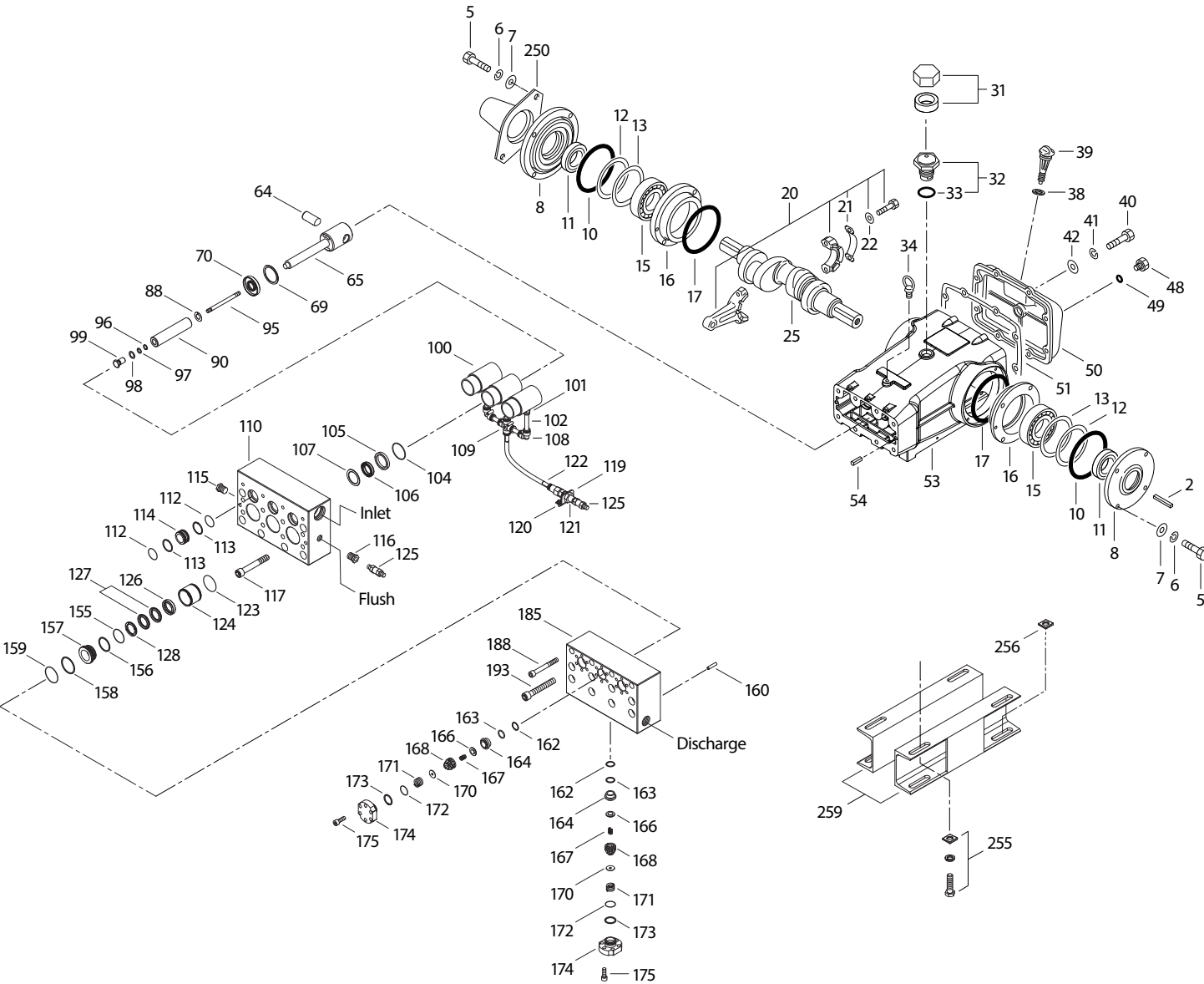
SPECIFICATIONS	U.S. Measure	Metric Measure
Flow	16.0 gpm	60.6 lpm
Pressure Range	400–3000 psi	27.6–207 bar
Pump RPM*	450	450
Inlet Pressure Range**	300–800 psi	21–55 bar
Min. Liquid Temperature	-20° F	-29° C
Bore	1.260"	32 mm
Stroke	2.579"	65.5 mm
Crankcase Capacity	10 qts	9.46 l

SPECIFICATIONS	U.S. Measure	Metric Measure
Inlet Ports (2)	1 ½" NPT(F)	1 ½" NPT(F)
Flush Ports (2)	½" NPT(F)	½" NPT(F)
Discharge Ports (2)	1" NPT(F)	1" NPT(F)
Shaft Diameter	1.772"	45 mm
Pulley Mounting	Either Side	Either Side
Weight	355 lbs	161 kg
Dimensions	29.68 x 23.98 x 11.97"	754 x 609 x 304 mm

* Pump minimum is 100 RPM.

** Temperature and pressure must be maintained to keep incoming CO₂ in a liquid state.

EXPLODED VIEW



PARTS LIST

ITEM	PN	MATL DESCRIPTION	QTY
2	43048	STL Key (M14 x 9 x 90)	1
5	89728	S Screw, HH (M10 x 40) (See Tech Bulletin 074)	8
6	15847	S Lockwasher (M10)	8
7	19934	S Washer, Flat (M10)	8
8	29443	ALE Cover, Bearing, Outer (See Tech Bulletin 118)	2
10	29444	NBR O-Ring, Bearing Cover-70D	2
11	11443	NBR Seal, Oil, Crankshaft	2
12	126594	STCP R Washer, Shim (M120 x 0.3)	0-2
13	126595	STCP R Washer, Shim (M120 x 0.5)	0-2
15	29441	STL Bearing, Roller	2
16	29442	STL Cover, Bearing, Inner	2
17	29444	NBR O-Ring, Bearing Cover-70D	2
20	766612	BBHS Assembly, Connecting Rod (Includes: 21, 22) (See Tech Bulletin 074)	3
21	126560	STCP R Washer, Locking	3
22	126593	STCP R Washer, Shim (M10.5 x 1.5)	6
25	29440	FCM Crankshaft, Dual Shaft (M65.5)	1
31	828710	PE Protector, Oil Cap with Foam Gasket	1
32	43211	ABS Cap, Oil Filler	1
33	14177	NBR O-Ring, Filler Cap-70D	1
34	126743	STCP R Bolt, Eye (M12) (For Lifting Pump Only)	1
38	129343	RBR Gasket, Flat Flex	1
39	27769	ABS Stick, Dip	1
40	89627	S Screw, HH (M10 x 30) (See Tech Bulletin 074)	8
41	15847	S Lockwasher (M10)	8
42	19934	S Washer, Flat (M10)	8
48	25625	STCP Plug, Drain (1/4" x 19 BSP)	1
49	23170	NBR O-Ring, Drain Plug-70D	1
50	29438	ALE Cover, Rear Outer (See Tech Bulletin 118)	1
51	129386	NBR Gasket, Rear Cover	1
53	133667	ALE Crankcase (Includes: 34, 54) Outer (See Tech Bulletin 118)	1
54	43282	S Pin, Guide	2
64	769481	CM Pin, Crosshead	3
65	768735	SSZZ Rod, Plunger	3
69	126588	STCP R Washer, Oil Seal	3
70	29454	NBR Seal, Oil Crankcase	3
88	45676	S Washer, Keyhole (M16)	3
90	43957	CC Plunger (M32 x 145)	3
95	89778	SS Stud, Plunger Retainer (M10 x 135)	3
96	20189	PTFE Backup Ring, Plunger Retainer	3
97	11345	NBR O-Ring, Plunger Retainer-70D	3
98	44085	SS Gasket, Plunger Retainer	3
99	44084	SS Retainer, Plunger (M10) (See Tech Bulletin 074)	3
100	703222	D Retainer, Seal	3
101	703146	BBNP Adapter, Tubing (3/8" NPT(M) x 12MM)	3
102	703142	NY Tubing (12MM)	6
103	998550	NY Nipple (1/2" NPT(M) x 1/4" NPT(M))	1
104	43875	NBR O-Ring, Adapter, Inlet-70D	3
105	45562	SS Adapter, Inlet, Low-Pressure	3
106	76298	ST2 Seal, Low-Pressure, with SS-Spring	3
107	44101	SS Washer, Low-Pressure	3
108	703145	D Elbow (12MM)	2
109	703144	D Cross, Barb (12MM)	1

ITEM	PN	MATL DESCRIPTION	QTY
110	701322	SS Manifold Inlet, Block-Style, Flushed	1
111	701116	SS Plug, Inlet Manifold [1 1/2" NPT(M)]	1
112	701632	NBR O-Ring, Spacer	6
113	701329	PTFE Backup Ring, Spacer	6
114	701327	SS Spacer, Inlet	3
115	45156	SS Plug, Hex Head [1/2" NPT(M)]	1
116	998032	SS Bushing [1/2" NPT(M) x 1/4" NPT(M)]	1
117	89694	S Screw, HSH (M16 x 110) (See Tech Bulletin 074)	6
119	34347	STZP Bracket	1
120	990776	STZP R Screw, HHC (1/4" - 20 x 1/2")	2
121	34338	BB Union, [1/4" NPT(M)]	1
122	703147	BBNP Adapter, Tubing [1/2" NPT(F) x 12MM]	1
123	12391	NBR O-Ring, V-Packing Cylinder-70D	3
124	701330	SS Cylinder, V-Packing	3
125	33937	SS Valve, Check [1/4" NPT(M)]	2
126	48390	D Adapter, Female	3
127	76608	ST4 V-Packing	6
128	704477	SS Adapter, Male	3
155	48861	NBR O-Ring, V-Packing Spacer, Inner-90D	3
156	48371	D Backup Ring, Spacer, Inner	3
157	45674	SS Spacer, V-Packing	3
158	48362	D Backup Ring, Spacer, Outer	3
159	48860	NBR O-Ring, V-Packing Spacer, Outer-90D	3
160	44756	S Pin, Guide	2
162	21985	PTFE Backup Ring, Seat	6
163	26089	NBR O-Ring, Seat-80D	6
164	44080	SS Seat	6
166	44081	SS Valve	6
167	44082	SS Spring	6
168	44735	PVDF Retainer, Spring	6
170	44794	SS Washer, Retainer	6
171	44793	SS Spring, Coil	6
172	15853	NBR O-Ring, Valve Plug-70D	6
173	20224	PTFE Backup Ring, Valve Plug	6
174	701260	SS Plug, Valve	6
175	87951	S Screw, HSH (M10 x 30) (See Tech Bulletin 074)	36
185	701320	SS Manifold, Discharge, Block-Style	1
188	701279	S Screw, HSH (M12 x 100), Lower (See Tech Bulletin 074)	4
193	89694	S Screw, HSH (M16 x 110), Upper (See Tech Bulletin 074)	8
250	29445	AL Protector, Shaft Outer (See Tech Bulletin 118)	1
255	33243	STZP Direct, Mount (Included with Pump)	1
256	29649	STCP Washer, Slant (M16) (Ensures Proper Alignment Between the Rail and Mounting Screw)	4
259	126604	STCP R Rail, Box (Included with Pump)	2
283	34314	— Kit, Oil Drain (3/8" x 48") (Not Shown)	1
290	6124	— Gasket, Liquid (3 oz)	1
300	76330	NBR* Kit, Seal (Includes: 97, 104, 106, 112, 113, 123, 127, 155, 156, 158, 159)	1
310	34751	NBR Kit, Valve (Includes: 162, 163, 164, 166, 167, 168, 170, 172, 173)	2
—	6102	— Oil, (2.5 gal) ISO-68 Hydraulic (Fill to Specified Crankcase Capacity Prior to Start-up)	1
—	6139	— Lubricant, Antiseize (8 oz) Outer (See Tech Bulletin 118)	1

*Review individual parts in each kit for material code identification. *Italics are optional items.*

R Components comply with RoHS Directive. For additional technical information see www.catpumps.com/literature/tech-bulletins.

MATERIAL CODES (Not Part of Part Number): ABS=ABS Plastic ALE=Aluminum Epoxy BBHS=Brass/High Strength BBNP=Brass/Nickel Plated BB=Brass

CC=Ceramic CM=ChromeMoly D=Acetal FCM=Forged Chrome-Moly NBR=Medium Nitrile (Buna-N) NY=Nylon PE=Polyethylene

PTFE=Pure Polytetrafluoroethylene PVDF=Polyvinylidene Fluoride RBR=Rubber S=304SS SS=316SS ST2=Special PTFE2

ST4=Special PTFE4 SSZZ=316SSZamak STCP=Steel/Chrome Plated STL=Steel STZP=Steel/Zinc Plated

⚠ CAUTIONS AND WARNINGS

All high-pressure systems require a primary pressure regulating device (i.e. regulator, unloader) and a secondary pressure relief device (i.e. pop-off valve, relief valve). Failure to install such relief devices could result in personal injury or damage to pump or property. Cat Pumps does not assume any liability or responsibility for the operation of a customer's high-pressure system.

Read all CAUTIONS and WARNINGS before commencing service or operation of any high-pressure system. The CAUTIONS and WARNINGS are included in each Service Manual and with each Accessory Data sheet. CAUTIONS and WARNINGS can also be viewed online at www.catpumps.com/dynamic-literature/cautions-and-warnings or can be requested directly from Cat Pumps.

WARRANTY

View the Limited Warranty online at www.catpumps.com/literature/cat-pumps-limited-warranty