KNIPCO PORTABLE HEATER MODEL F-155A Spec. No. 3012G04 & 3102G02 Form No. 2661-1 (2/71)

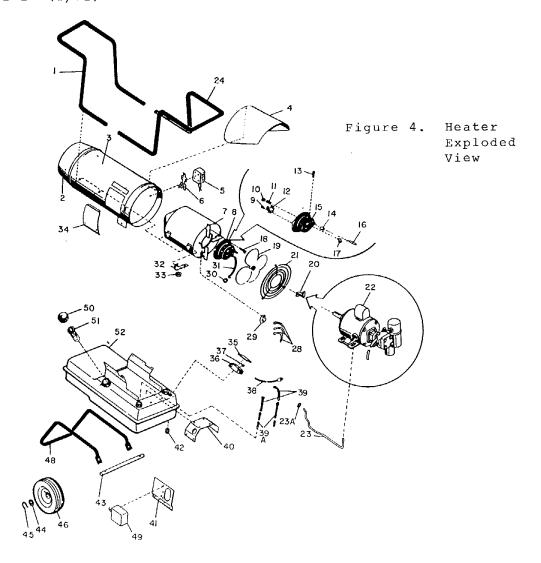
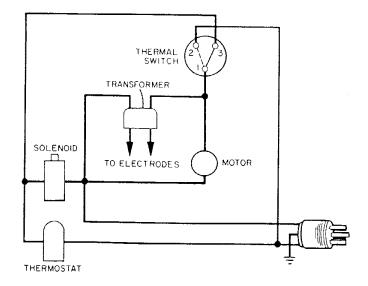


Figure 3. Wiring Diagram



SECTION III PARTS LIST

This section contains a list of all service parts used in the equipment covered by this manual. Standard hardware items are indicated by the symbol (*).

Check the model decal for correct model number

of the equipment. Include the model, specification, and serial numbers when ordering parts. Order parts by part name and part number only. Do not use index numbers from the illustration when ordering parts.

NTC- M198 *M110 M198 *M109 M109 M109 M112 M112 M176 M176 *ST1- M158 M109 M109 M112 M118 M110 M158 M100 M160 M176 M176	345-34 -3C 810B 084-27 805-1B 084-27 908-27 64B 084-28 271-6 6570 696 -2BC 314B 084-27 58G6 07G1	Handle, Front Screw, Machine, Oval hd. 10-24 x 2 in. Nut, Torque lock 10-24 Cone, Nose Screw, Self-Tapping, hex hd. No. 10-32 x 1/2 (Nose Cone to Outer Shell) Shell Assy, Outer Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 4 4 1 4 1 6 4 4 1 3 3 1 - 2 1 1 1	1 4 4 1 6 1 6 4 4 1 3 3 - 1 2 1 1
NTC- M198 *M110 M198 *M109 M336 *M109 M336 *M110 M112 M176 M10 M10 M11 M427 M10 M10 M10 M10 M10 M10 M10 M1	-3C 810B 084-27 805-1B 084-27 908-27 64B 084-28 271-6 570 596 -2BC 314B 084-27 58G6 07G1	Nut, Torque lock 10-24 Cone, Nose Screw, Self-Tapping, hex hd. No. 10-32 x 1/2 (Nose Cone to Outer Shell) Shell Assy, Outer Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	4 1 4 1 6 4 1 3 3 1 - 2 1 1 1	4 1 6 1 6 4 1 3 3 - 1 2 1 1 1
2 M198 *M110 3 M198 *M110 *M109 4 M336 *M110 4 M336 *M110 5 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	810B 084-27 805-1B 084-27 908-27 64B 084-28 271-6 670 696 -2BC 314B 084-27 58G6 07G1	Cone, Nose Screw, Self-Tapping, hex hd. No. 10-32 x 1/2 (Nose Cone to Outer Shell) Shell Assy, Outer Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 4 1 6 4 1 3 3 1 - 2 1 1 1	1 6 1 6 4 4 1 3 3 - 1 2 1 1 1
*M110 3 M198 *M100 4 M336 *M100 4 M336 *M110 5 M176 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	084-27 805-1B 084-27 908-27 64B 084-28 271-6 670 696 -2BC 314B 084-27 58G6 07G1	Screw, Self-Tapping, hex hd. No. 10-32 x 1/2 (Nose Cone to Outer Shell) Shell Assy, Outer Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	4 1 6 4 4 1 3 3 1 - 2 1 1 1	6 1 6 4 1 3 3 - 1 2 1 1 1
3 M198 *M110 *M109 4 M336 *M110 M112 5 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	805-1B 084-27 908-27 64B 084-28 271-6 570 696 -2BC 814B 084-27 58G6 07G1	Cone to Outer Shell) Shell Assy, Outer Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 6 4 4 1 3 3 1 - 2 1 1 1	1 6 4 4 1 3 3 - 1 2 1 1 1
*M110 *M109 4 M336 *M100 4 M336 *M110 M112 5 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	084-27 908-27 64B 084-28 271-6 570 696 -2BC 314B 084-27 58G6 07G1	Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	6 4 4 1 3 3 1 - 2 1 1 1	6 4 4 1 3 3 - 1 2 1 1 1
*M109 4 M336 *M110 M112 5 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	908-27 64B 084-28 271-6 570 596 -2BC 314B 084-27 58G6 07G1	Shell to tank) Screw, Self-tapping, hex hd. No. 10-32 x 1/2 (Outer Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	4 4 1 3 3 1 - 2 1 1 1	4 4 1 3 3 - 1 2 1 1 1
4 M336 *M110 M112 5 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	64B 084-28 271-6 570 596 -2BC 314B 084-27 58G6 07G1	Shell to Combustion Chamber) Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	4 1 3 3 1 - 2 1 1 1 1	4 1 3 3 - 1 2 1 1 1
*M110 M112 M176 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	084-28 271-6 570 596 -2BC 314B 084-27 58G6 07G1	Cowl Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 3 1 - 2 1 1 1	1 3 3 - 1 2 1 1 1
*M110 M112 M176 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	084-28 271-6 570 596 -2BC 314B 084-27 58G6 07G1	Screw, Self-tapping, hex hd. No. 10-12 x 5/8, Type A (Cowl to Outer Shell) Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	3 1 - 2 1 1 1	3 - 1 2 1 1 1
5 M176 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	570 596 -2BC 314B 084-27 58G6 07G1	Nut, Tinnerman (Cowl to Outer Shell) Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 - 2 1 1 1	1 2 1 1 1
5 M176 M176 M176 *ST1- 6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	570 596 -2BC 314B 084-27 58G6 07G1	Thermostat Assy Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 - 2 1 1 1	1 2 1 1 1
M176 *ST1- M158 *M110 M975 M910 *RC1- M910 M11 M427 M397 M397 M14 M167 M109 M16 M398 M17 M229 M80 M324 M324 M67	596 -2BC 314B 084-27 58G6 07G1	Thermostat Assy. Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	2 1 1 1 1	2 1 1 1 1
*ST1- M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	2BC 814B 084-27 58G6 07G1	Screw, Rd. hd. No. 6-18 x 1/4 in. (Thermostat) Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 1 1	2 1 1 1 1
6 M158 *M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	814B 084-27 58G6 07G1	Bracket, Thermostat Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 1 1	1 1 1
*M110 7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	084-27 58G6 07G1	Screw, Self-tapping, hex hd. No. 10-12 x 1/2 Combustion Chamber Assy Burner Head Assy	1 1	1 1
7 M975 8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	58G6 07G1	Combustion Chamber Assy Burner Head Assy	1	1
8 M910 9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF		Burner Head Assy	4	1
9 *RC1- 10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF			1	I -
10 M910 11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	-2	Screw, Rd. hd. No. $6-32 \times 1/4$	2	2
11 M427 12 M397 13 *HF3- 14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	3	. Nozzle	1	1
13	74	. Nozzle Spring	1	1
14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	78	. Air Deflector	1	1
14 M167 15 M109 16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	-3	. Screw, Hex hd., No. $10-32 \times 3/8$	2	2
16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	,	. Electrode Bushing	2	2
16 M398 17 M229 18 *M124 19 M992 20 M180 21 M324 22 REF	947	. Body, Burner	1	1
18 *M124 19 M992 20 M180 21 M324 22 REF	31	. Electrode	2	2
19 M992 20 M180 21 M324 22 REF	94	. Elbow Compression, 90°	1	1
20 M180 21 M324 22 REF	461-16	Screw Hex hd. No. $8-32 \times 5/8$	2	2
21 M324 22 REF	28	Fan	1	1
22 REF	025	Key, Fan Locating	1	1
,	17	Fan Guard Assembly	1	1
REF		Motor and Pump Assy (See figure 5)	1	-
1		Motor and Pump Assy (See figure 6)	-	1
*HC4-	-6C	Screw, Hex hd., $1/4-20 \times 3/4$	4	4
*NTC-	-4	Nut, Torque Lock 1/4-20	4	4
10013		Connector, Straight (Solenoid Leads)	1	1
23 M198	336	Fuel Line	1	-
M228		Fuel Line	-	1
23A 10005		Grommet (Fuel line to shell)	1	1
24 M198		Handle, Rear	1	1
			4	4
*M123		Screw, Oval hd. 10-24 x 2	2	2

FIG. & INDEX NO.	PART NUMBER	PART NAME	3012G04	3102G02
4-	*NTC-3C	Nut, Torque Lock 10-24	6	6
	*WP-3C	Washer, Flat	2	2
25		Deleted		
26		Deleted		
27		Deleted	4	1
28	M19916-1	Wiring Harness Assy	1	1
29	М5895	Switch, Thermal	$\begin{array}{ c c }\hline 1 \\ 2 \end{array}$	1 2
	M8152 *M11084-40	Spacer, (Thermal switch to burner head) Screw, Self-tapping, Hex hd. No. 8-15 x 5/8 in. Type A (Thermal switch to burner head)	2	2
30	1000576	Grommet (Electrode Leads through shell)	2	2
31	M10816G36	Lead, Electrode	2	2
32	M4785	Fin, Deflector	1	1
34	*M11084-38	Screw, Self-tapping Hex hd. No. 8-15 x 3/8, Type A	2	2
33	M6821	Grommet (Deflector fin)	1	1
34	M8633-2B	Door, Access	1	1
34	*M11084-40	Screw, Self-tapping, Hex hd. No. 8-15 x 5/8 in.	2	1
	M11271-5	Nut, Tinnerman	2	2
35	M5837	Cover, Box	1	1
36	M6016	Box, Utility	1	1
00	*HF3-4C	Screw, Hex hd. 10-32 x 1/2	2	2
	*NTF-3C	Nut, Torque Lock 10-32	2	2
37	M3530	Grommet	5	4
38	M10813G12	Extension Cord Assy	1	1
•	1001349	Connector, Straight	1	1
	M13942-4	Connector, Wire	4	4
39	M3334G10	Fuel Line Assembly	2	2
39A	M18919-2	Intake Tube Assy	2	2
40	M19807A	Bracket, Motor Support	1	1
41	M19808A	Bracket, Transformer Support	1	1
	*M12461-52	Screw, Hex hd. No. 10-24 x 5/8	5	5
	*WP-3C	Washer, Plain	5	5
	*NTC-3C	Nut, Torque Lock	5	5
42	M13990	Plug, Pipe 1/4 in.	1	1
43	M16801-2	Axle	1	1
44	*WP-8C	Washer, Flat	2	2
45	M16741-15	Ring, Retaining	2	2
46	М19295	Wheel	2	2
47		Deleted		
48	M12831A	Frame, Wheel Support	1	1
49	M19518-1	Transformer, Lead Alteration	1	1
	*NPC-4C	Nut, Hex 1/4-20 (Transformer to Bracket)	2	2
	*WLM-4C	Lockwasher (Transformer to Bracket)	2	2 1
50	M18051	Cap, Filler Neck	1	1
51	M18053	Screen, Filler Neck	1	1
52	M19801-1A	Fuel Tank Assy	1 1	1
	M17071	Decal, Trade name	1	_ '
	M19824	Decal, Nameplate	1	
	M19825-4	Decal, Model Decal, Wiring	1	1
	M9134 M18196	Decal, Mig. By	1	1
	M16420		1	
	M20532-3	Decal, Caution Decal, Pump Prime	1	1
	M3486-5	Tubing, Varnished	1	-
	M3486-4	Tubing, Varnished (Solenoid leads)		1
	M22743	Decal, Warning		ı
	M22888-2	Decal, Model	_	i
	M22887	Decal, Nameplate	_	1
	11223001	Touch-up Paint - Aerosol Can		-
	M13386-3	Green		
	M13386-8	Black		
	M13386 -4	Yellow		
*~.		ainable locally.		1

IG.& NDEX NO.	PART NUMBER	PART NAME	QTY.
_		Motor and Pump Assy (See 22, figure 4)	N/A
1	57413	Elbow, Street 1/4 in.	1
2	M3973	Filter	1
	M4307	. Filter Can	1
	M3301-2	. Filter Gasket	1
	M3301	. Filter Element	1
3	M20480	Nipple, Pipe, 1/4 x 2-1/2 in.	I
4	57379	Elbow, Street, 1/8 pipe x 1/8 pipe	1
5 6	69246	Nipple, Hex, 1/8 pipe	1
6	M3974-5	Solenoid Assy	1
7	1000513	Connector, Male	1 1
8	M18364	Pump	1
9	*HC5-7C	Screw, Hex hd, 5/16-18 x 3/4 in.	4
10	*WLM-5C	Washer, Lock 5/16 in.	4
11	* WP-5C	Washer, Plain 5/16 (Bottom only)	2
12 13	M18365 * RF3-6	Adaptor	1 ~
13	* WLM-3	Screw, Round Hd., No. 10-32 x 3/4 in.	3 3
15	M18436	Washer, Lock, No. 10	1
16	M18366	Spring Coupling	1 1
17	M9809-2	Motor	1 1
18	M12650-8	Capacitor	1 1
		assembly. Order individual parts if required.	'
		obtainable locally.	İ
			17 16 / 15

Form No. 2661-1 (2/71)

Figure 5. Motor and Pump Assembly, Spec. No. 3012G04

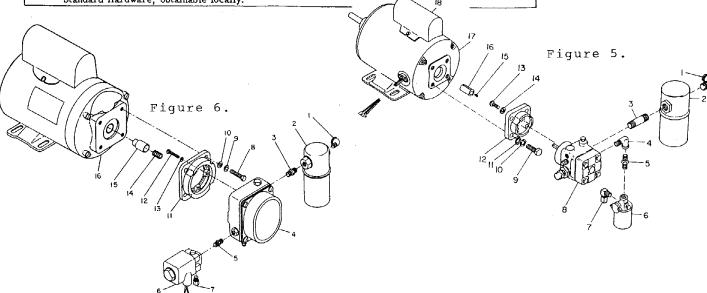


Figure 6. Motor and Pump Assembly Spec. No. 3102G02

FIG. & INDEX NO.	PART NUMBER	PART NAME	QTY.
6-		Motor and Pump Assy	N/A
1	57413	Elbow, Street 1/4 in.	2
2	M3973	Filter, Fuel	1
	M4307	. Filter Can	1 1
	M3301-2	. Filter Gasket	1
	M3301	. Filter Element	1
3	M3463	Nipple	1
4	M22872~1	Pump, Fuel	1
5 6	69246	Nipple, Pipe 1/8 in.	1
	M3974-2	Valve, Solenoid	1
7	1000513	Connector, Male	1
8	*HC5-7C	Screw, Hex hd. 5/16-18 x 3/4 in.	4
9	*WLM-5C	Lockwasher 5/16 in.	4
10	*WP-5C	Washer, Plain 5/16 in.	4
11	M22348	Adaptor	1
12	*RF3-6	Screw, Rd. hd., No. 10-32 x 3/4 in.	. 3
13	*WLM-3	Lockwasher No. 10	3
14	M18436	Spring	1
15	M22873	Coupling	l î
16	M19915	Motor, Lead Alteration	1
N/A 1	l Not available as a Standard Hardware	 service part. Order individual parts. Procure locally.	