

PARTS LIST AND SERVICE GUIDE MODEL 600

14279

SALSBURY

ENGINE



Parts for Salsbury Air-Cool Engine

Scooter Engine

Industrial Engine

> Marine Engine

Power Package Engine

Engine Adaptable for Garden Tractors

Conveyors

Water Pumps

Power Saws

Compressors

Cultivators

Etc.

SALSBURY MOTOR DIVISION

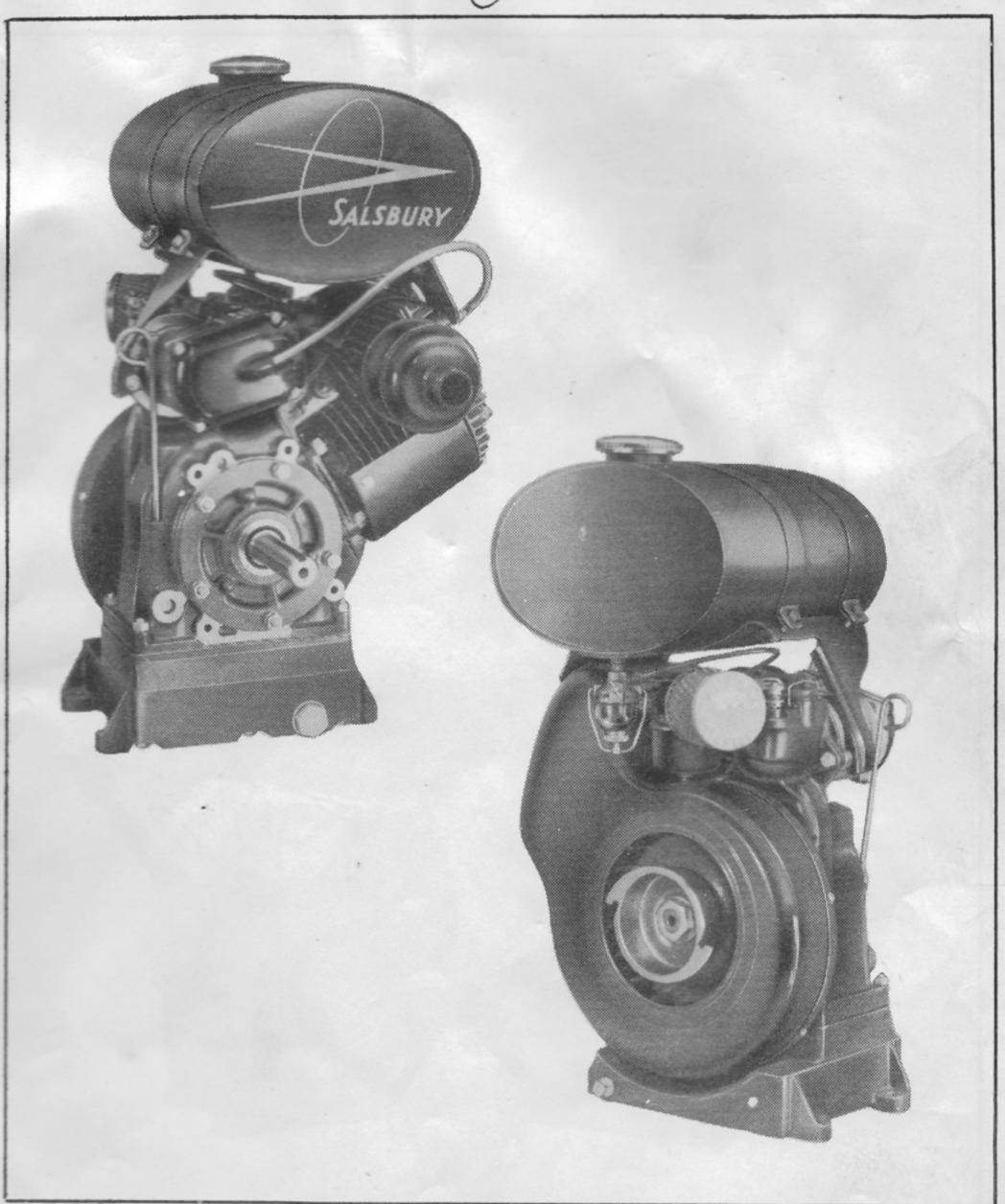
A Subsidiary of Emery Engineering Corp.

GENERAL OFFICE: 4385 E. OLYMPIC BLVD., LOS ANGELES 23, CALIF. FACTORY PARTS DEPT.: 5247 COFFMAN, PICO ROAD, PICO, CALIF.

SALSBURY

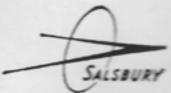
PRICE \$1.25

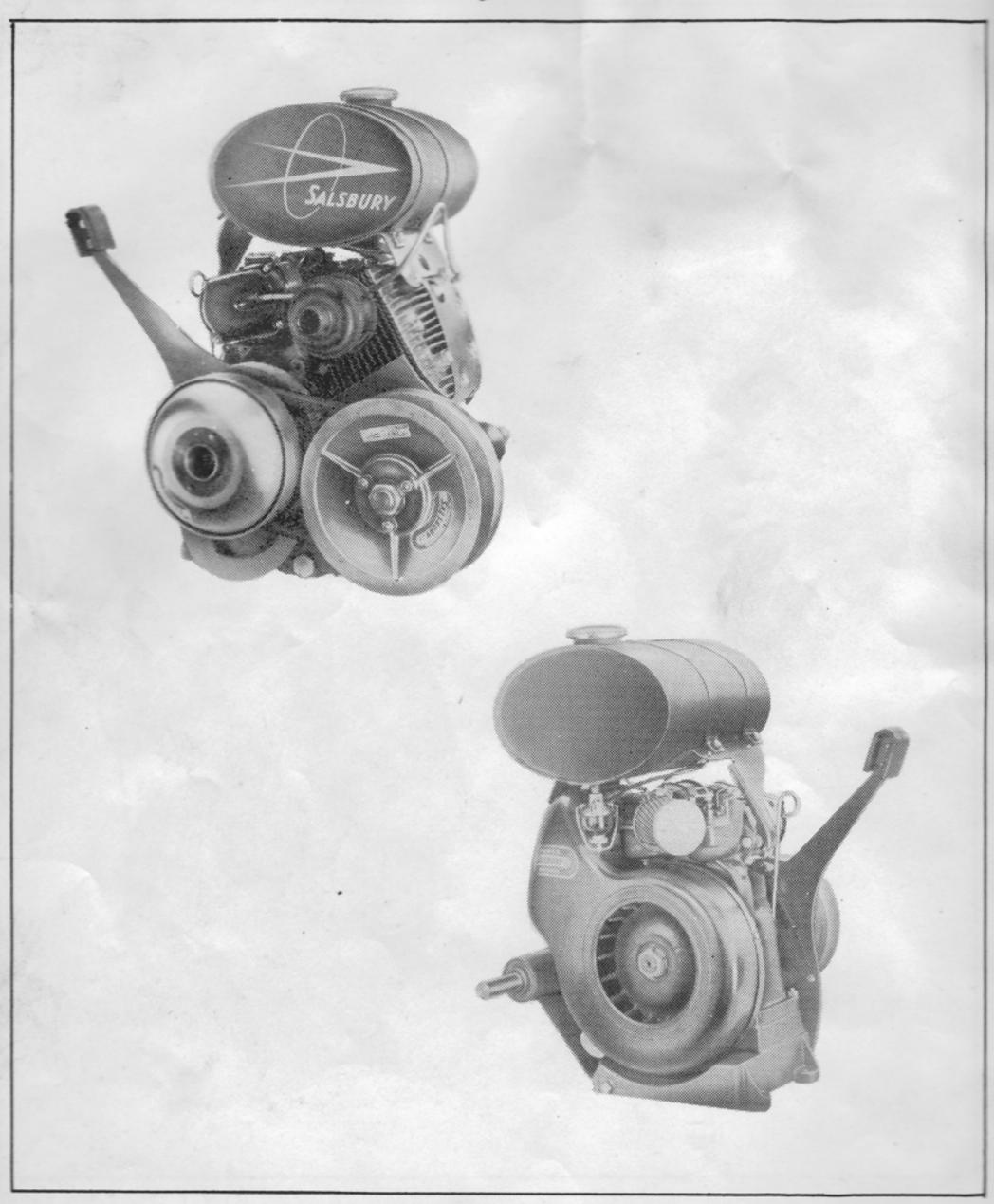




MODEL 600 INDUSTRIAL ENGINE

EMERY ENGINEERING CORPORATION

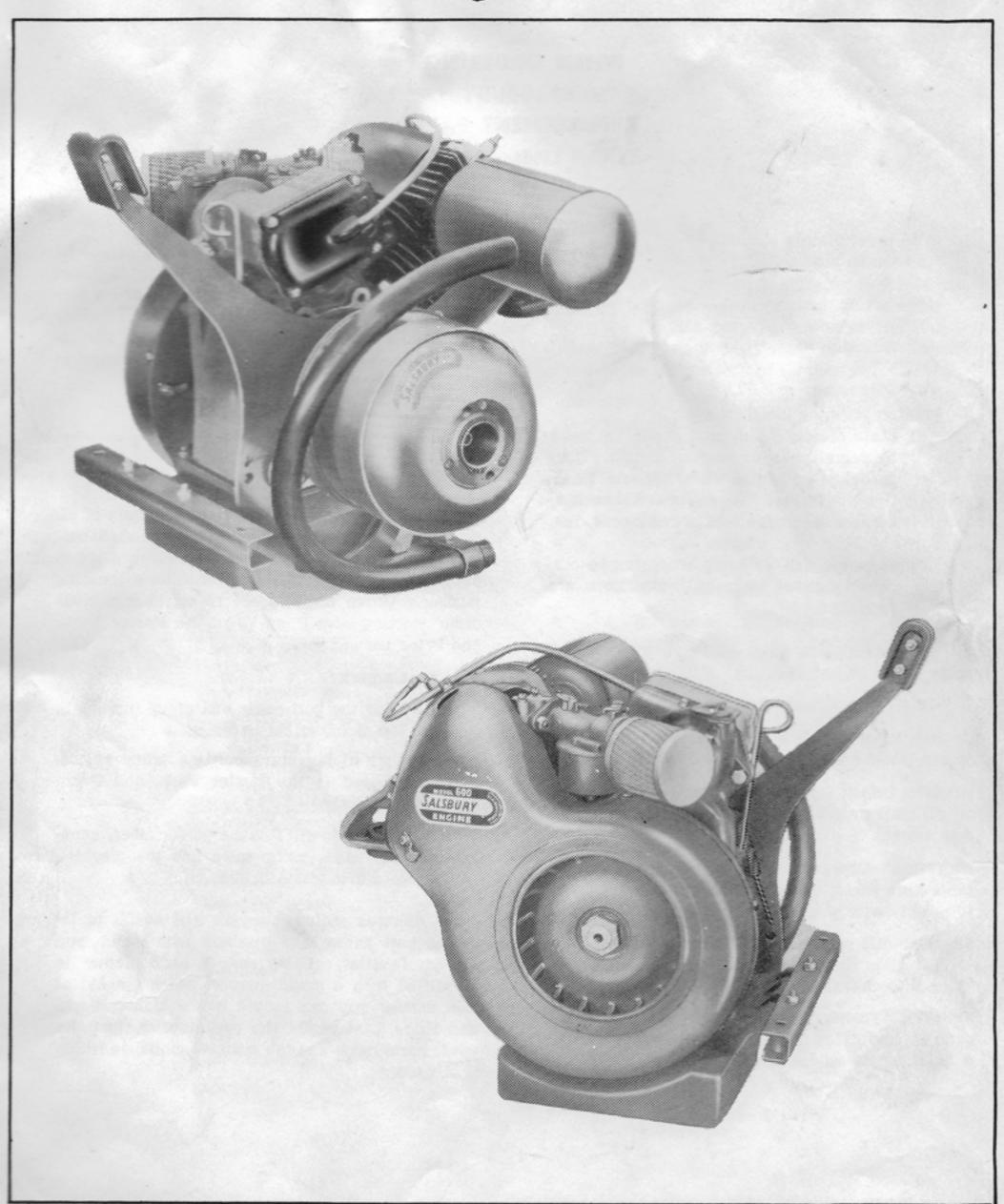




MODEL 600 POWER PACKAGE

EMERY ENGINEERING CORPORATION





MODEL 600 MOTOR SCOOTER ENGINE AUTOMATIC CLUTCH AND AUTOMATIC TRANSMISSION

EMERY ENGINEERING CORPORATION



WHEN ORDERING SALSBURY REPLACEMENT PARTS

- 1. Write order plainly stating:
 - (a) Group number.
 - (b) Part number.
 - (c) Quantity.
 - (d) Part name.
- 2. Furnish shipping instructions:
 - (a) State clearly if shipment should be made by parcel post, express or freight. If by parcel post, advise when "Special Handling" is desired. Parcel post shipments, without insurance, are at customers risk.
 - (b) Shipment will be made according to our best judgment when no instructions are furnished.
- 3. Write clearly the mame and address to which parts are to be shipped.

GENERAL INFORMATION

ENGINE NUMBER: The engine number is stamped on the lower crankcase flange below the magneto.

MINIMUM CHARGE: Charge of \$1.00 will be made on all mail orders, for parts valued at less than this amount.

CRATING: Charge will be made for crating of large-size parts, or parts requiring special pack-to comply with shipping instructions given.

PRICES: All prices are F.O.B. factory of Emery Engineering Corp. at Pico, California and are subject to change without notice.

SPECIFICATIONS: Specifications and materials used in production of parts are subject to change without notice unless fixed by written contract.

not be responsible for any goods damaged or lost in transit, or for any errors made in any of its publications or other forms of printed matter, including these Parts Books. Errors in pricing, invoicing or nomenclature, are subject to correction at any time.

On Pages 16 and 17 you will find the names of all Salsbury Model 600 Engine Parts listed alphabetically. Each part name has been given a group number. This group number serves as a locating number. Group numbers are listed in numerical order starting with Page 19 of the Master Parts and Price List Pages.

To locate a part:

- (a) Find the part name and group number in the alphabetical pages.
- (b) Turn to the corresponding group number located in the Master Parts and Price List Pages.
- (c) There you will find the part number, quantity used, parts name and the machine model in which it is used.

Parts pictures included herein will assist in locating part names and numbers with which you are not familiar. Every part in each picture is identified with a group number. With the aid of this number you can locate in the Master Parts and Price List pages the part number, quantity used, parts name and the machine model in which it is used.



SALSBURY REPLACEMENT PARTS

On Page 18 you will find a numerical parts list for use as a cross reference.

When ordering parts, always use the group number, part number, part name and quantity desired.

Engine parts groups are listed below:

Group 0.001 to 0.999 Engine

Group 1.001 to 1.999
Carbureter
Exhaust
Starters
Tanks and Lines
Throttles and Accelerators

Group 2.001 to 2.999
Flywheel Generator
Wires
Magneto

Group 3.001 to 3.999 Governor

Group 6.001 to 6.999 Standard Screws

Group 6.001 to 6.999

Standard Screws
Nuts
Washers
Cotter Pins
Cap Screws
Bolts

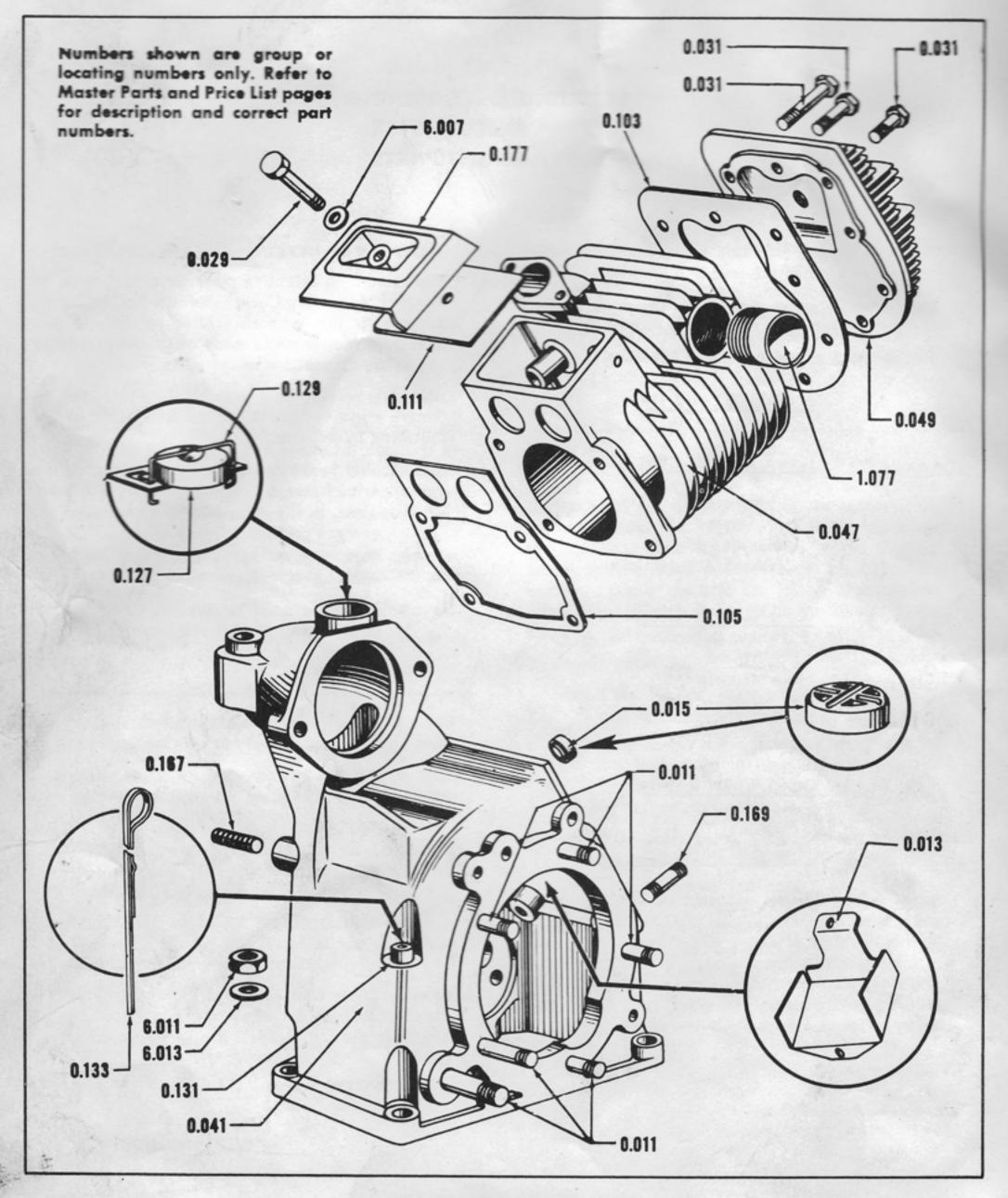
RETURN OF DEFECTIVE PARTS FOR CREDIT

When returning defective parts for credit, write to Emery Engineering Corp. for the special form devised for this purpose. After we receive this form from you, properly made out, we will advise you of the disposition of the parts.

When you receive your authorization to return defective parts for credit, return according to the following information.

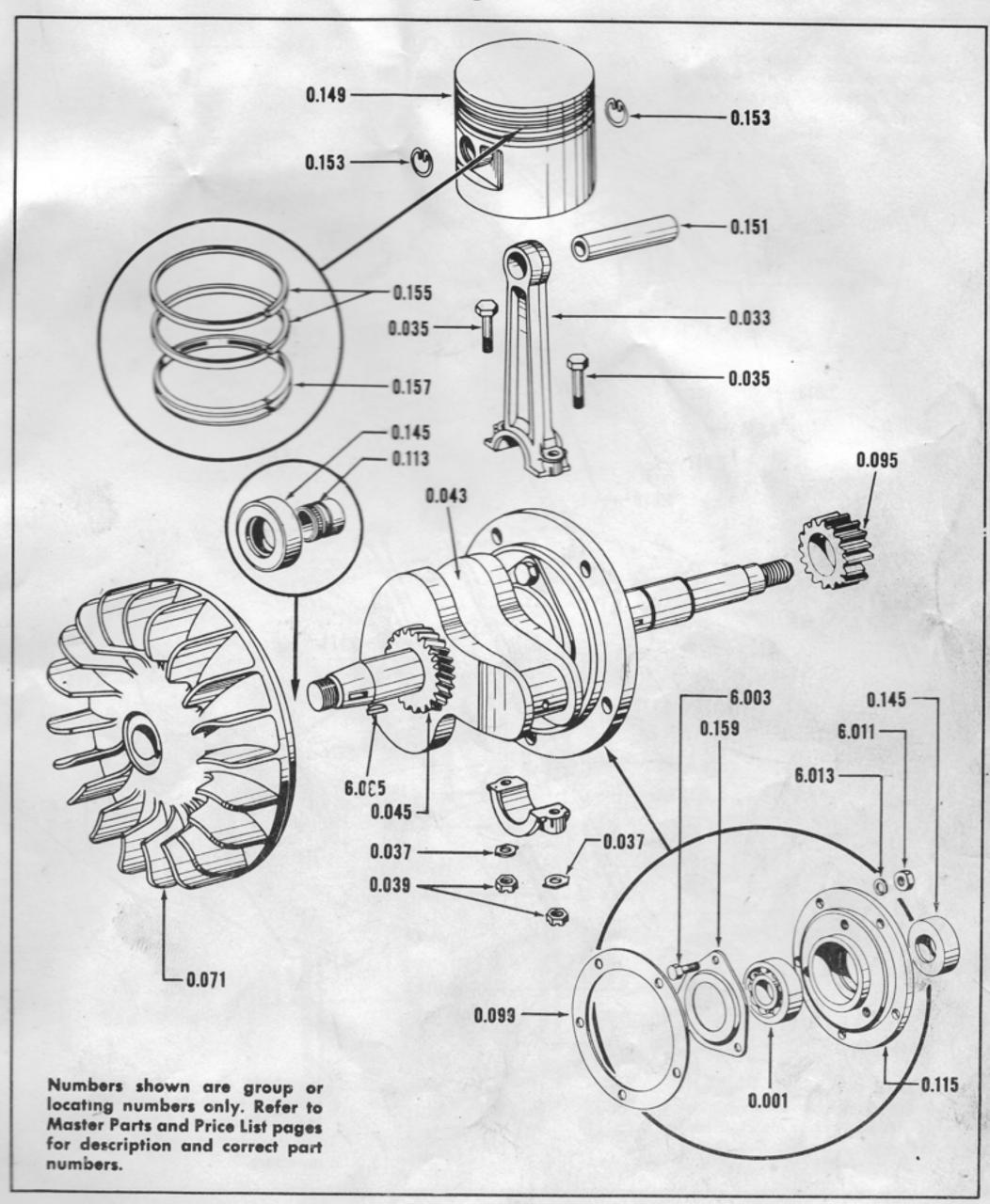
- Ship to Service Department, Emery Engineering Corp. Salsbury Motors Division, Pico, California, with transportation charges prepard.
- Mark outside of package with sender's name and address.
- All parts must be tagged. Show group number. part number and name.





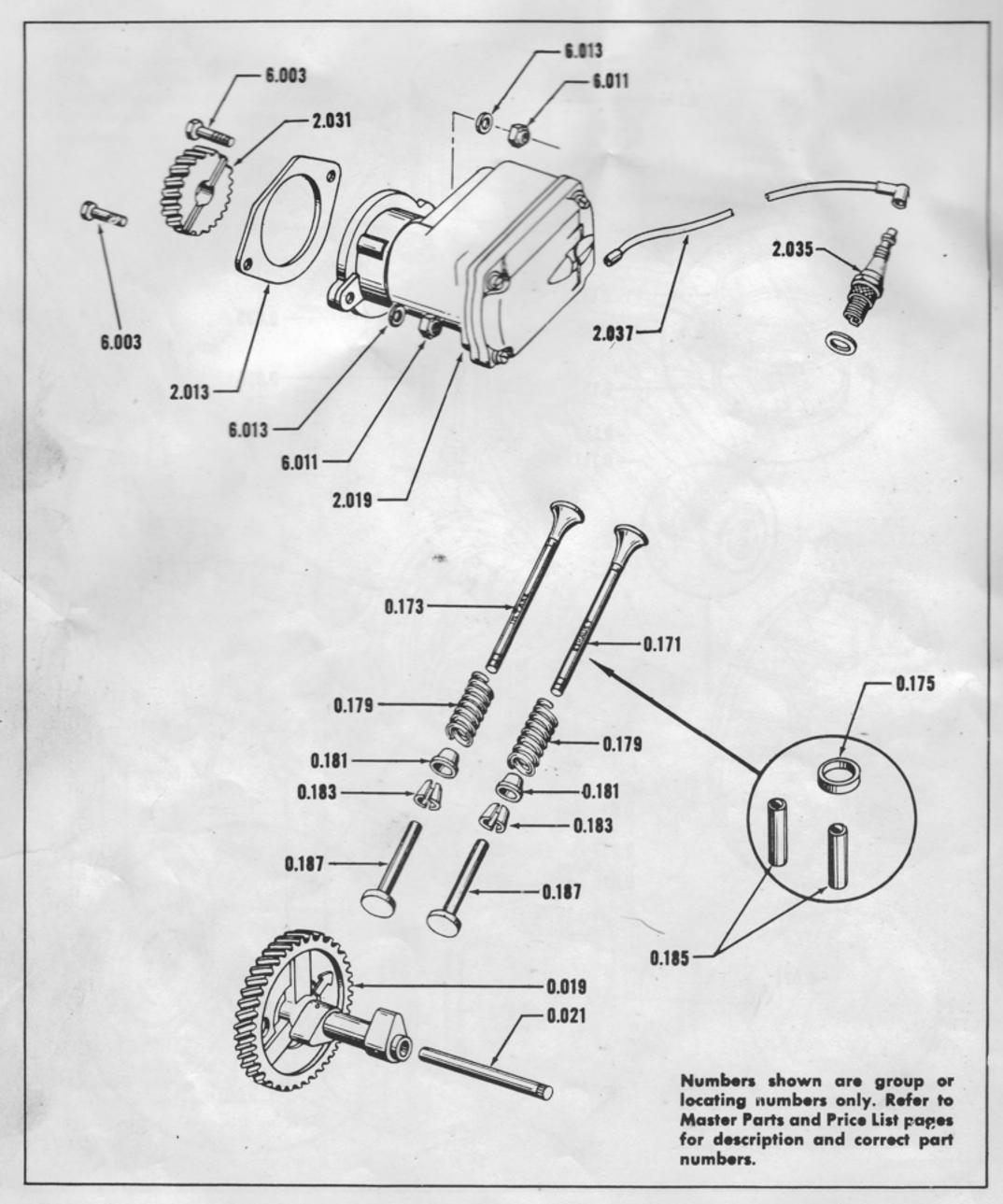
MODEL 600 ENGINE PARTS





MODEL 600 ENGINE PARTS

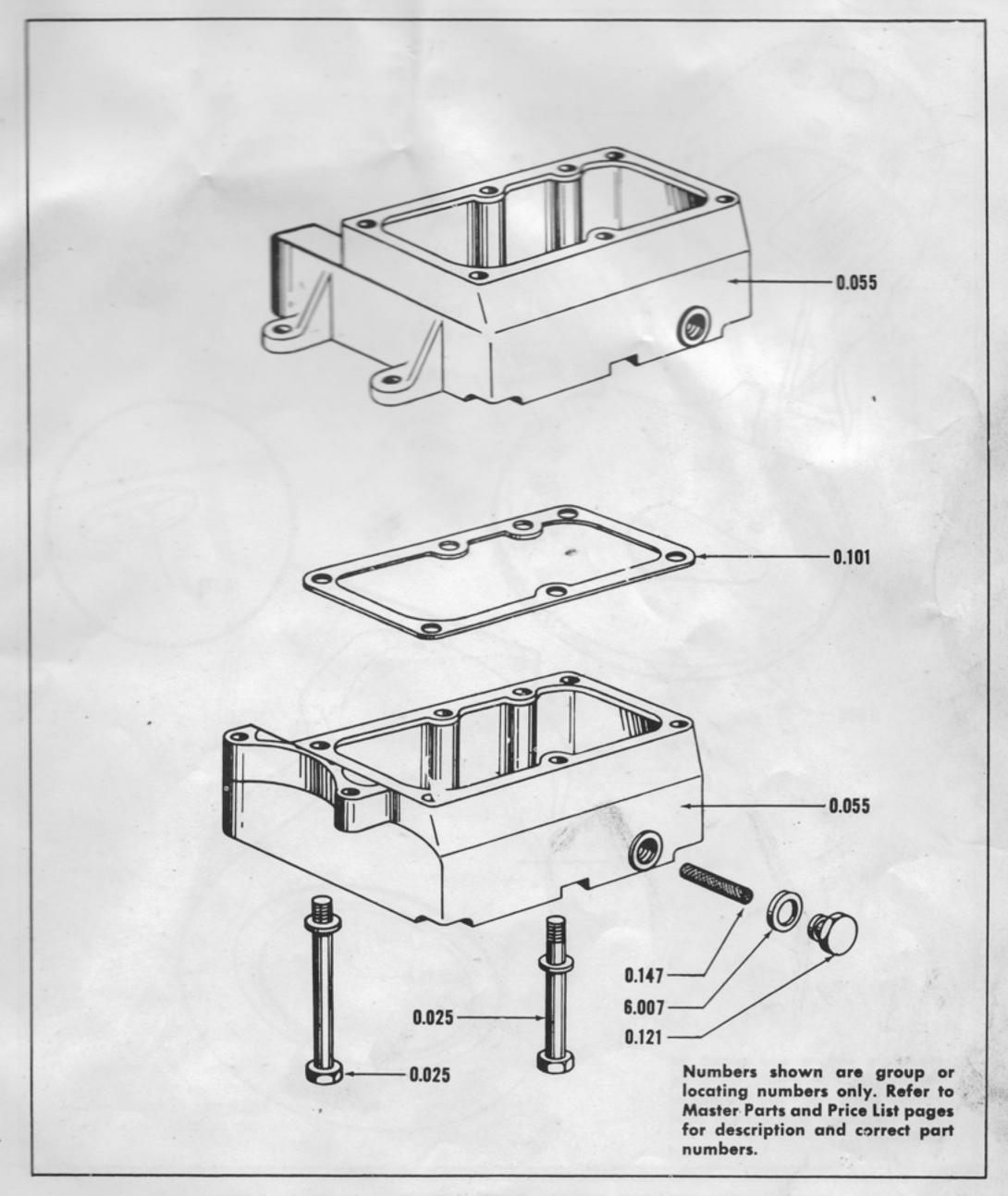




MODEL 600 ENGINE VALVES-CAMSHAFT-MAGNETO-OIL PUMP



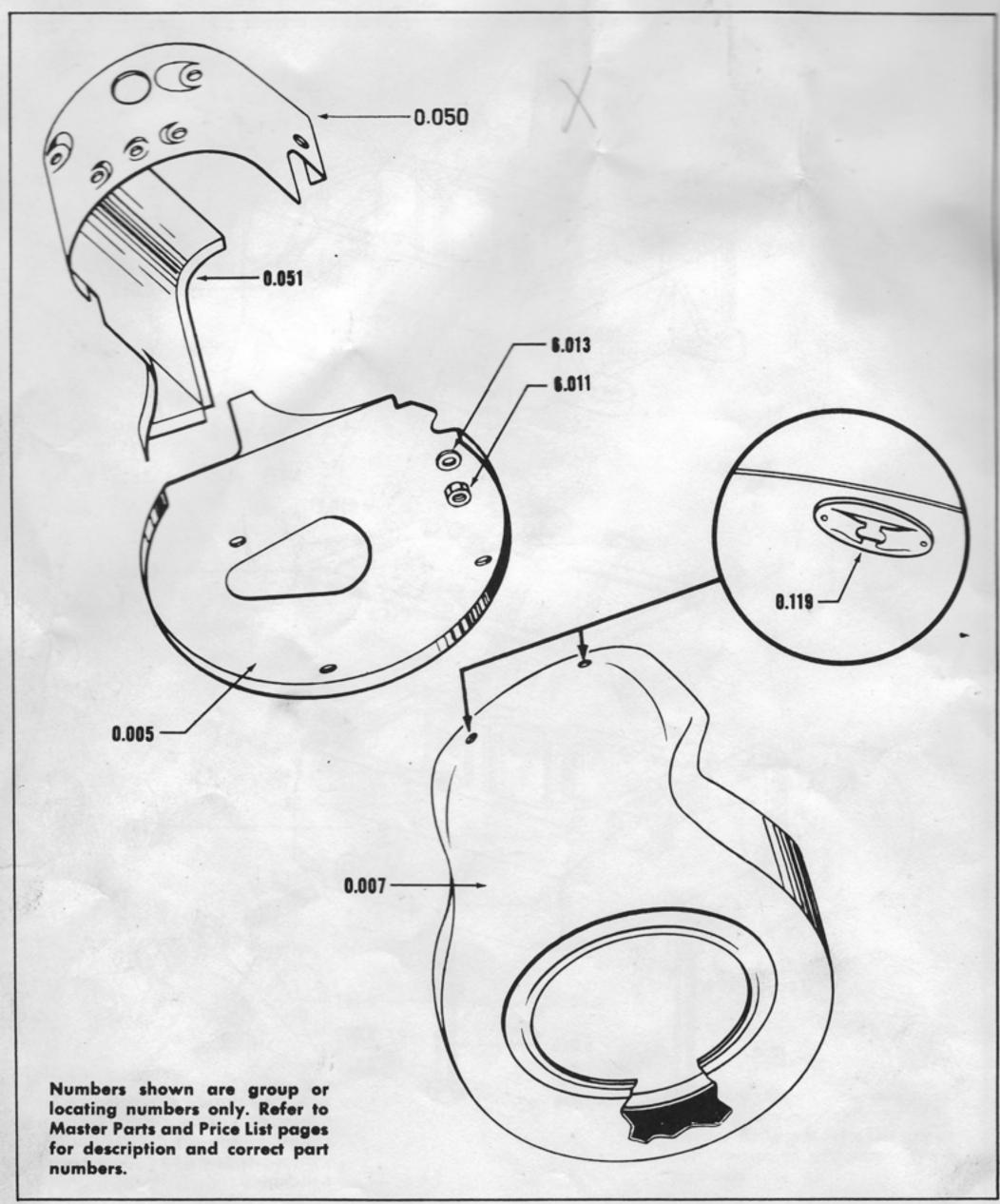
June 1, 1700



MODEL 600 ENGINE BASE PARTS

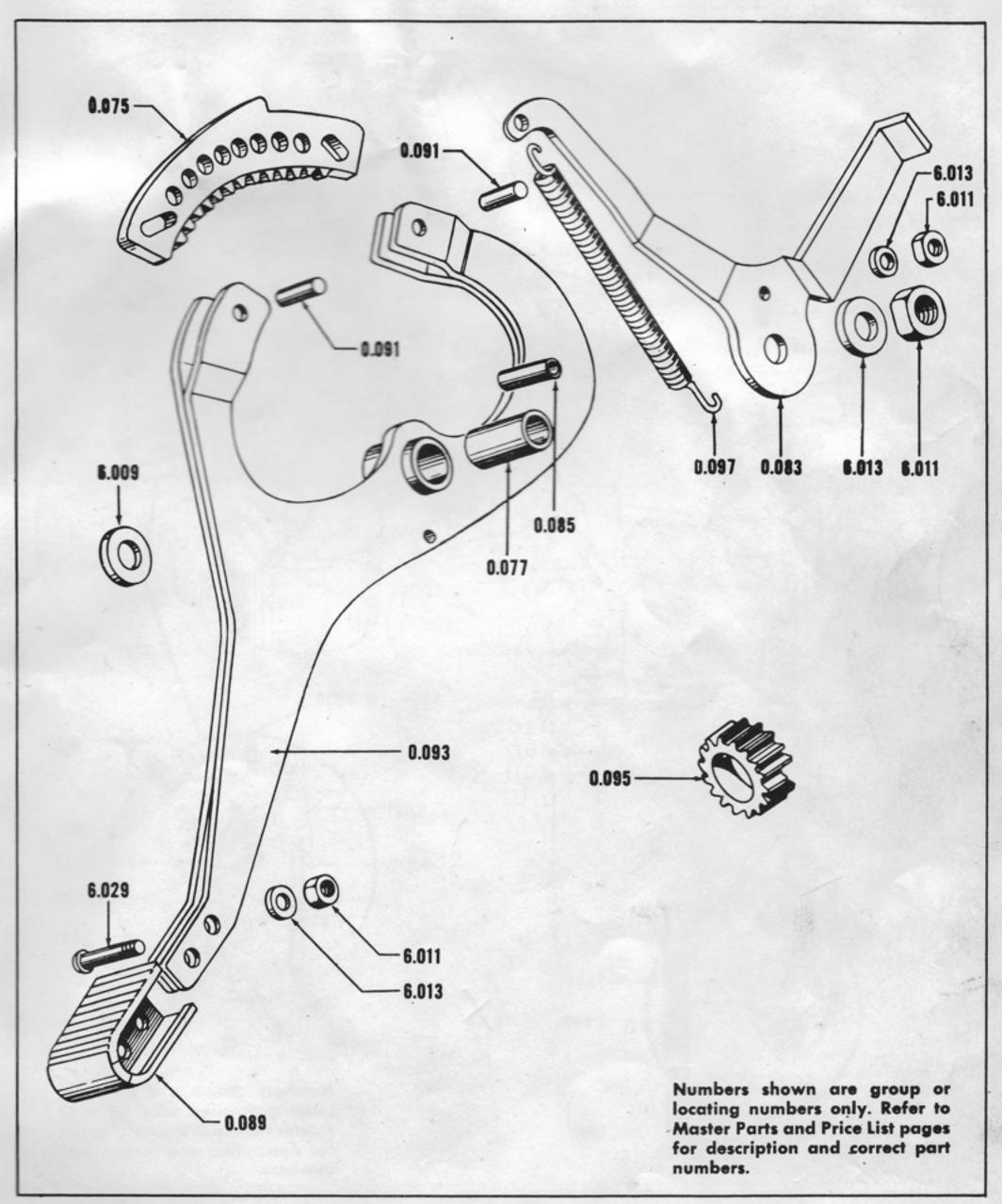
EMERY ENGINEERING CORPORATION





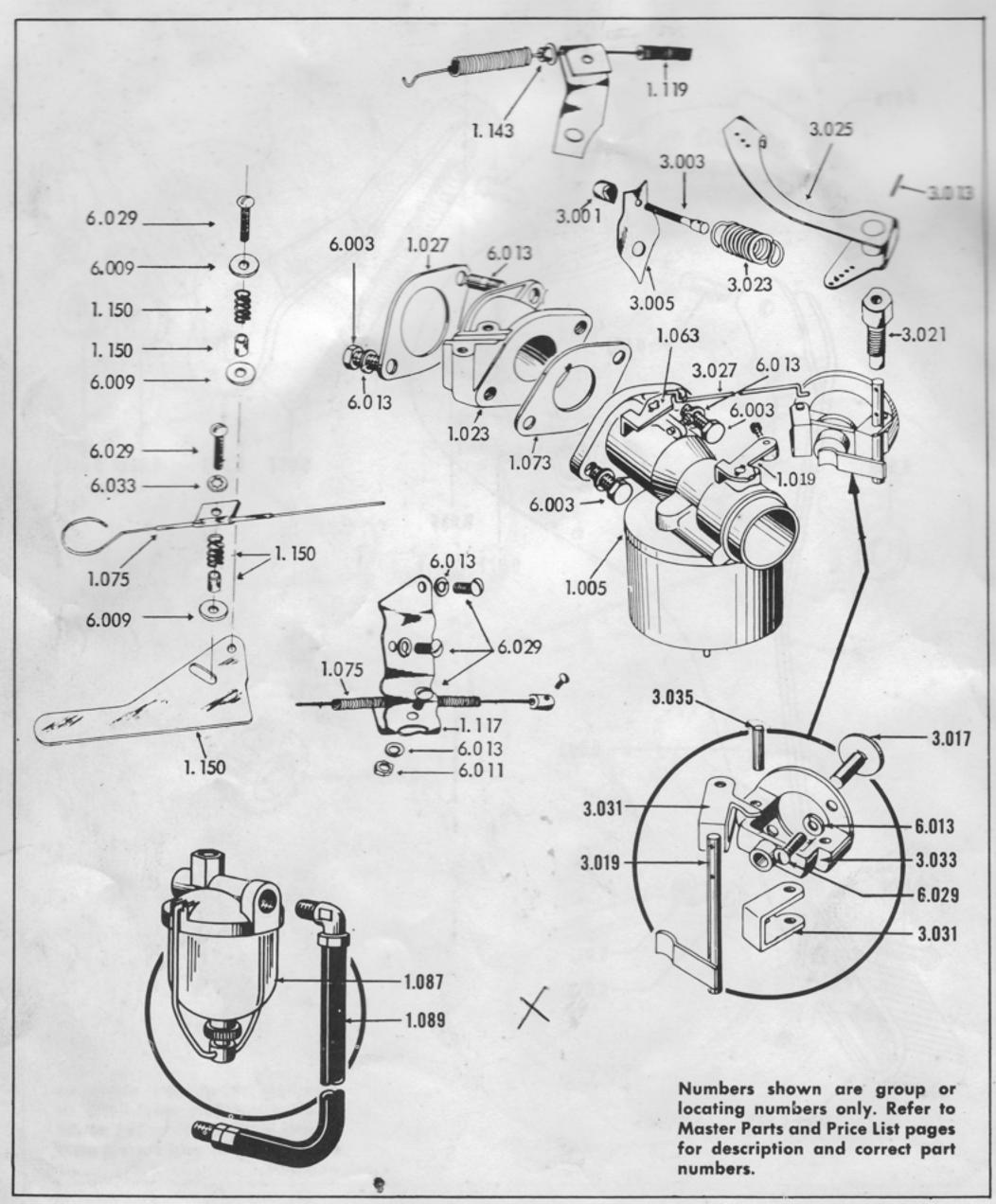
MODEL 600 ENGINE COVER AND BLOWER HOUSING ASSEMBLY





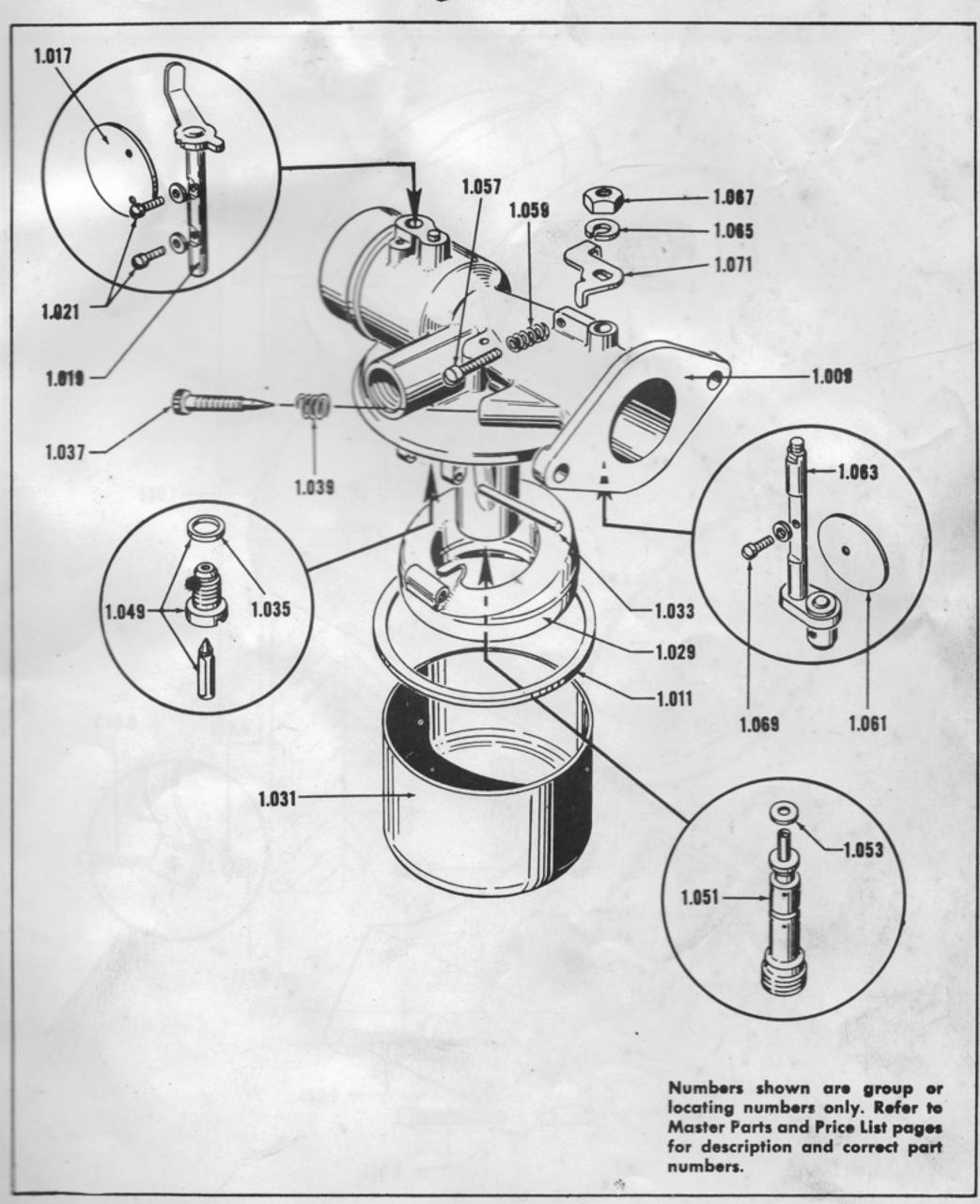
FOOT STARTER PEDAL PARTS FOR SCOOTER AND POWER PACKAGE UNIT





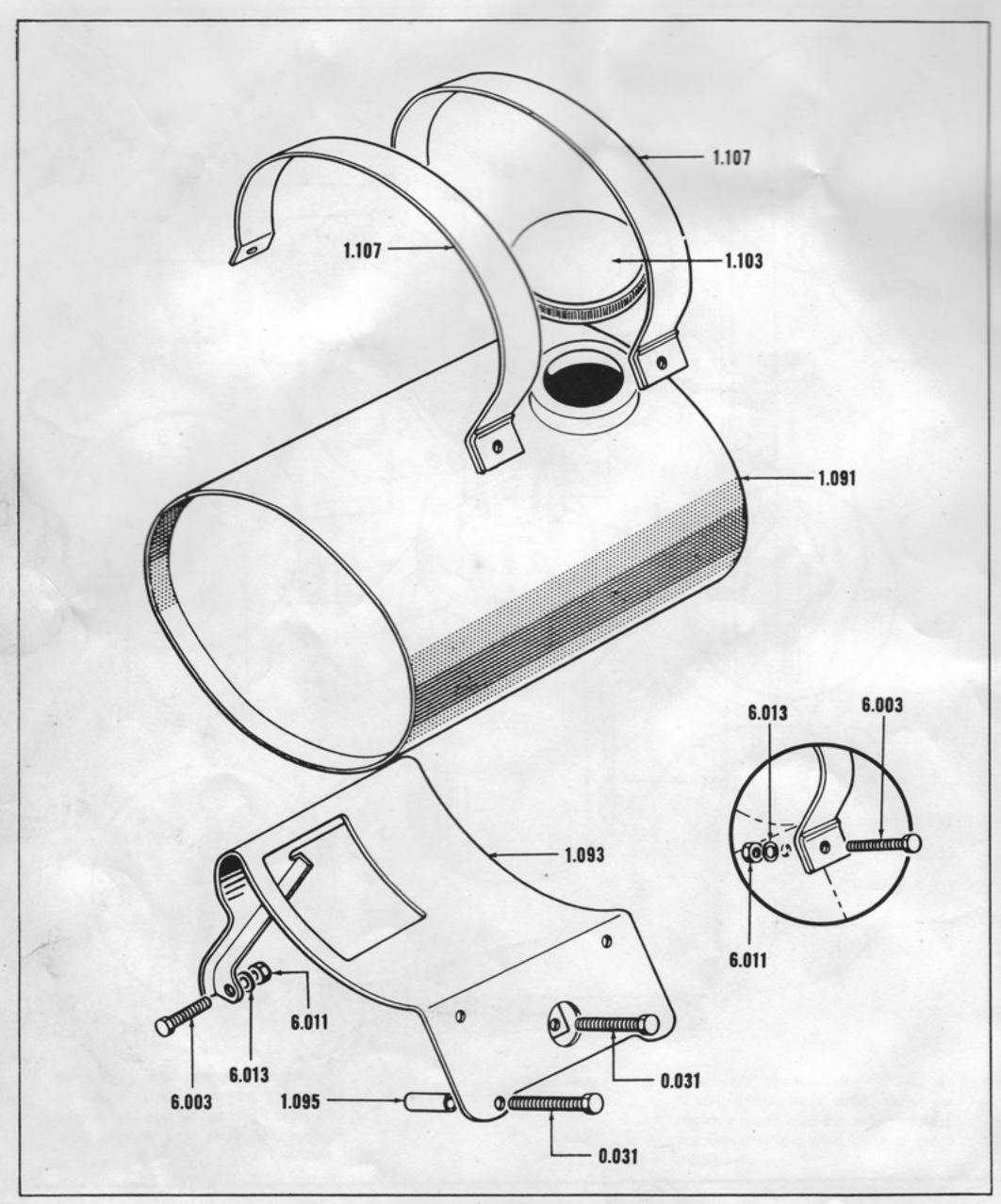
CARBURETOR-GOVERNOR





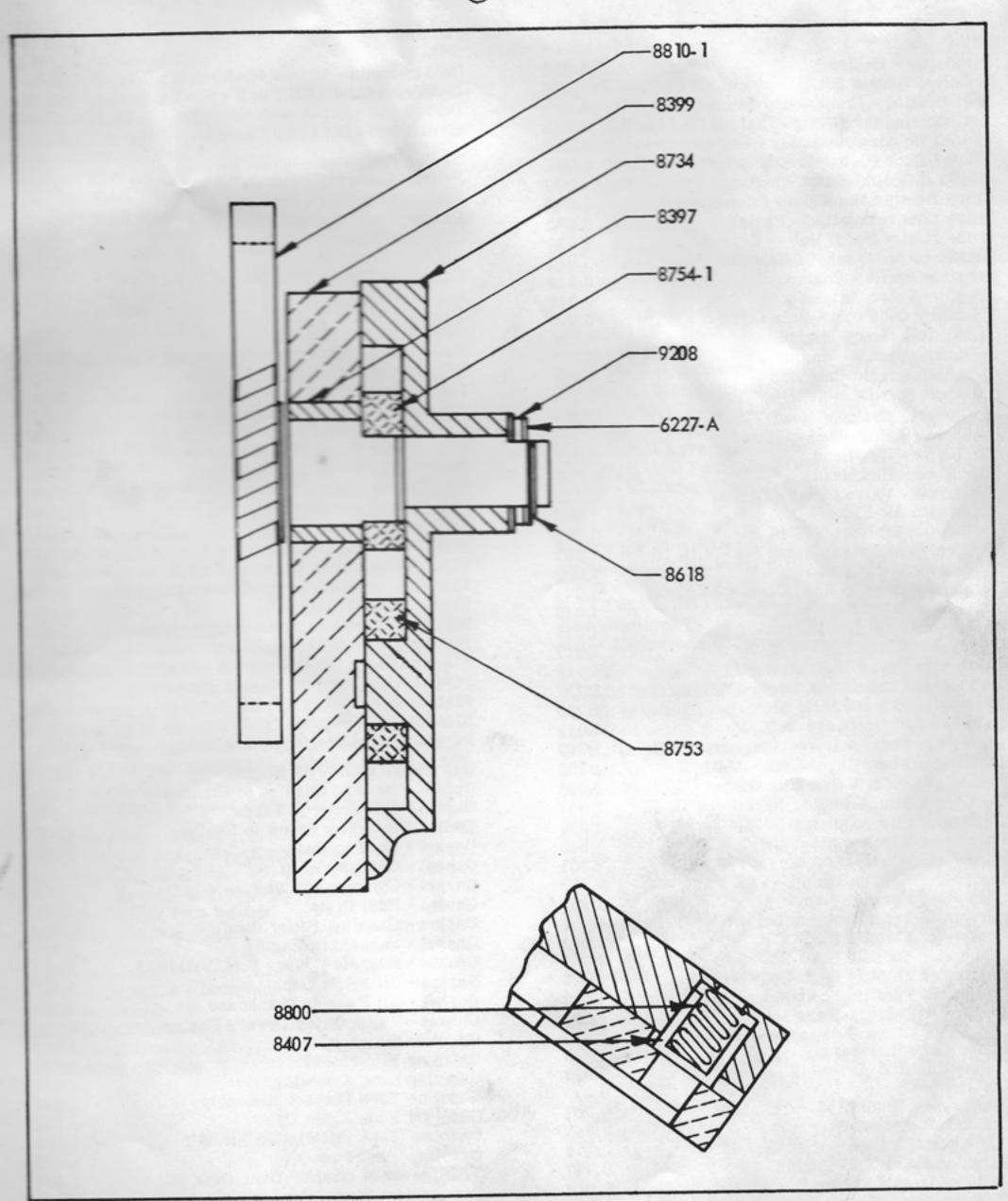
PARTS FOR MARVEL CARBURETOR (VH - 26)





INDUSTRIAL GASOLINE TANK INSTALLATION





8801-2 OIL PUMP

EMERY ENGINEERING CORPORATION

ALPHABETICAL INDEX

Part Name	Group No.	Part Name	roup No.
			roup No.
Air Baffle - Engine	0.052	Decalcomania - Blower Housing	5.025
Assorted Gasket Set	0.100	Dee Drive Gear - Oil Pump - Steel	0.143
Ball Bearing - Crankshaft - Engine	0.001	Dowell Pin - Crankshaft Gear	0.046
Ball Bearing Snap Ring - Crankshaft - Engine		Dowell Pin - Oil Pump Case	0.143
Blower Housing Assembly - Engine	0.007		
Blower Back Plate - Engine	0.005	Engine Assembly - Industrial	0.053
Body - Gasoline Filter	1.088	Engine Assembly - Power Package Unit	0.053
Bolt - Bearing Housing to Crankcase 0.011	0.001	Engine Assembly - Scooter	0.053
Bolt - Connecting Rod - Engine	0.035	Engine Base Assembly	0.055
Bolt - Starter Pedal Hub	0.011	Exhaust Nipple	1.077
Bolt Retainer Bracket - Gasoline Filter	1.088	Exhaust Pipe Clamp	1.113
Breather Baffle - Engine	0.013	Expansion Plug - Foot Starter Pivot Bolt	
Breather Valve Assembly	0.015	Hole - Engine	0.069
Bushing - Oil Pump - Main Drive Shaft	0.143		
Camshaft & Gear - Engine	0.019	Foot Starter Clevis Pin	0.088
Camshaft Spindle - Engine	0.021	Foot Starter Gear Segment Assembly	0.075
Camshaft Spindle Hole Cap	0.024	Foot Starter Hub Bearing	0.077
Camshaft Spindle Hole Plug - Engine	0.023	Foot Starter Mounting Bracket	0.083
Cap Screw - Cylinder Head	0.031	Foot Starter Mounting Bracket Spacer	0.085
Cap Screw - Flat Head - Slotted	6.001	Foot Starter Pedal Assembly Complete	0.087
Cap Screw - Hex Head	0.027	Foot Starter Pedal Pad Assembly	0.089
Cap Screw - Hex Head	6.003	Foot Starter Pedal Sub-Assembly	0.093
Cap Screw - Valve Cover - Engine	0.029	Foot Starter Pinion Gear	0.095
Carbureter Air Filter	1.003	Foot Starter Return Spring	0.097
Carbureter Assembly - V.H. 26	1.005	Fuel Pump	1.086
Carbureter Assorted Gasket Set - V.H. 26	1.007	Flywheel - Plain - Engine	0.071
Carbureter Body Assembly - V.H. 26	1.009	Flywheel Armature Mounting Clip	2.003
Carbureter Body to Bowl Gasket - V.H. 26	1.011	Flywheel Armature Stepped Insulating Washer	2.005
Carbureter Bowl Nut - V.H. 26	1.013	Flywheel for Generator	0.071
Carbureter Bowl Nut Gasket - V.H. 26	1.0 15	Flywheel Generator Armature Assembly	2,007
Carbureter Choke Fly - V.H. 26	1.017	Flywheel Generator Magnet Assembly	2.009
Carbureter Choke Shaft Assembly	1.0 19	Fiber Washer - Oil Drain Plug - Engine	6.007
Carbureter Choke Shaft Screw - V.H. 26	1.021	Flywheel & Generator Magnet Assembly	0.071
Carbureter Elbow - V.H. 26	1.023	Flat Washer	6.009
Carbureter Float Bowl - V. H. 26	1.031	Flat Washer Magneto	2.028
Carbureter Float & Lever Assembly - V.H. 26	1.029	Flywheel Armature Insulating Washer	2.001
Carbureter Float Lever Shaft - V.H. 26	1.033	Gas Tank - Industrial Engine	
Carbureter Float Valve Seat Gasket - V.H. 26	1.035	Gasket - Bearing Housing to Crankcase	1.091
Carbureter Idle Adjusting Needle - V.H. 26	1.037	Gasket - Carbureter to Elbow	0.099
Carbureter Idle Adjusting Needle Spring	1.039	Gasket Carbureter Elbow to Engine	1.073
Carbureter Matched Float Valve & Seat	1.049	Gasket - Case to Base	1.027
Carbureter Nozzle Assembly - V.H. 26	1.051	Gasket - Case to Base Gasket - Cylinder Head	0.101
Carbureter Nozzle Gasket - V.H. 26	1.053	Gasket - Cylinder to Case	0.103
Carbureter Package Repair Kit - V.H. 26	1.055	Gasket - Fuel Pump	0.105
Carbureter Throttle Adjusting Screw - V.H. 26	1.057	Gasket - Fuel Fullip Gasket - Gasoline Filter Bowl	1.086
Carbureter Throttle Fly - V.H. 26	1.061		1.088
Carbureter Throttle Shaft Assembly - V.H. 26	1.063	Gasket - Magneto to Engine	2.013
Carbureter Throttle Shaft Lock Washer	1.065	Gasket - Magneto Cover - F.M. VMJ1B78	2.011
Carbureter Throttle Shaft Nut - V.H. 26	1.067	Gasket - Oil Filler Cap	0.107
Carbureter Throttle Shaft Screw - V.H. 26	1.069	Gasket - Oil Pump to Crankcase	0.109
Cap Screw - Case to Base	0.025	Gasket - Valve Spring Cover - Engine	0.111
Choke Control Assembly	1.075	Gasoline Filter	1.087
Connecting Rod Assembly	0.033	Gasoline Filter Bowl	1.088
Cotter Pin	6.005	Gasoline Line Assembly	1.089
Crankcase - Engine	0.041	Gasoline Tank Bracket Assembly	1.093
Crankshaft Assembly	0.043	Gasoline Tank Filler Cap	1.103
Cup - Relief Valve	0.143	Gasoline Tank Installation Kit 10"	1.091
Cylinder Assembly - Engine	0.143	Gasoline Tank Pads	1.091
Cylinder Head - Engine	0.047	Gasoline Tank Straps - Oval Tank 10"	1.107
Cylinder Head Cover	0.050	Gear - Crankshaft	0.045
Cylinder Jacket	0.051	Gear Idler - Oil Pump	0.143
	31002	Gear & Shaft Main Drive - Oil Pump	0.143

ALPHABETICAL INDEX

Part Name G	roup No.	Part Name	Group No.
Governor Adjusting Nut	3.001	Palnut - Parkerized	6.015
Governor Adjusting Screw	3.003	Pipe Plug	6.019
Governor Assembly	3.000	Piston - Engine - Standard	0.149
Governor Bracket	3.005	Piston - Pin - Engine - Oversize	0.151
Governor Carrier Assembly	3.009	Piston Ring Set - Oversize	0.154
Governor Groove Pin	3.013	Piston Ring - Compression - Oversize	0.155
Governor Plunger	3.017	Piston Ring - Oil Control - Oversize	0.157
Governor Shaft Assembly	3.019	Plate Main Bearing Retainer - Engine	0.159
Governor Shaft Guide Bushing	3.021	Rivet - Flat Head	6.025
Governor Spring - Tension	3.023	Rivet - Oval Head	6.045
Governor Throttle Arm Assembly	3.025	Rivet - Round Head	6.039
Governor Throttle Wire to Carbureter	3.027	Rope Starter	0.161
Governor Weight	3.031	Rope Starter Pulley	0.163
Governor Weight Carrier	3.033		
Governor Weight Pin	3.035	Screen - Gasoline Filter	1.088
Hex Head Plug - Air Baffle	0.016	Screw Fillister Head	6.027
Hex Nut	6.011	Screw - Hex Head	6.003
Hex Nut - Connecting Rod	0.039	Screw - Magneto Cover - No. 10	2.030
		Screw P.K. Blower Housing - Engine	0.165
Lock Plate - Oil Pump	0.143	Screw - Round Head - Slotted - Brass	6.029
Lock Ring - Piston Pin	0.153	Set Screw - Headless	6.031
Lock Washer	6.013	Short Circuit Lever - Magneto	2.016
Lock Washer - Connecting Rod Bolt	0.037	Snap Ring - Oil Pump Main Drive	0.143
Lock Wire - Oil Filler Cap	0.129	Spacer - Cylinder Head	0.034
Magneto - Fairbanks Morse VMJ 1B78	2.019	Spark Plug	2.035
Magneto Breaker Point Set - Fairbanks	2.025	Spark Plug Clip	2.038
Magneto Coil Assembly	2.024	Spark Plug Wire Assembly	2.037
Magneto Condenser -	2.027	Spring - Relief Valve - Oil Pump	0.143
Magneto Cover -	2.029	Spring - Throttle Control	1.150
Magneto & Gear Assembly	2.021	Steel Cover - Oil Pump	0.143
Magneto Gear	2.031	Stud - Backing Plate to Crankcase - Engine	
Magneto Ground Wire Assembly	2.026	Stud - Cylinder to Crankcase - Engine	0.169
Magneto Impulse Spring	2.032	Tee Nut	6.042
Main Bearing Assembly - Sleeve Type	0.113	Throttle & Choke Control Assembly Kit	1.124
Main Bearing Housing	0.115	Throttle Control	1.150
Muffler - Industrial - Power Package Unit	1.109	Throttle Control Bushing	1.150
Needle & Packing Assembly - Gasoline Filter	1.088	Throttle Control Spring	1.150
Nut - Oil Pump	0.117	Thrust Washer "D" - Oil Pump	0.143
Nut - Tinnerman - Blower Housing - Engine	0.119	Tube Elbow - 3/16" - Fuel Pump	1.088
Oil Drain Plug - Engine	0 101	Valve Exhaust - Engine	0.171
Oil Filler Cap Assembly - Engine	0.121	Valve Inlet - Engine	0.173
Oil Gauge Shield Guide	0.127	Valve Seat Insert Exhaust - Engine	0.175
Oil Level Gauge - Engine	0.131	Valve Spring - Engine	0.179
Oil Level Gauge Felt Washer	0.133 0.135	Valve Spring Cover - Engine	0.177
Oil Level Gauge Guide - Engine	0.137	Valve Spring Seat - Emgine Engine	0.181
Oil Pump Assembly	0.137	Valve Spring Seat Lock - Engine	0.183
Oil Pump Cover	0.143	Valve Stem Guide - Engine	0.185
Oil Pump Housing - Aluminum	0.143	Valve Tappet - Engine	0.187
Oil Pump Repair Kit	0.143		
Oil Seal - Crankshaft - For Sleeve Bearing	0.110	Washer - Bronze020 - Oil Pump	0.143
and Ball Bearing	0.145	Washer - Cylinder Head	0.032
Oil Strainer - Engine	0.147	Washer - Shakeproof - 3/8" - Internal	6.033
		Wing Nut - ¼" - 20	6.041
		Woodruff Key No. 11	6.035

NUMERICAL PARTS NUMBER LIST

Part No.	Group No.	Part No.	Group No.	Part No.	Group No.	Part No.	Group No.
2433	2.027	6629	0.075	6984	6.013	8484	0.157
2437	2.025	6635	0.071	6985 6986	6.013 6.013	8485	0.157
5350	0.173	6637	0.083	6990	6.033	8488 8477	2,035
5351	0.171	6643 6646	0.085 0.077	6991 .	6.033	8478	0.149
5352 5354	0.175 0.181	6649	0.011	6992	6.033	8504	1.093
5356	0.183	6650	0.093	6993	6.033	8515	0.137
5358	0.187	6651-2	0.087	6995	6.033	8518	0.135
5364	0.037	6660	2.003	6997	6.033	8545	0.041
5366	0.159	6696	1.023	6996	6.013	8555	1.089
5378	0.151	6702	0.127	8000	6.009	8570	0.155
5380	0.047	6713-1	1.091	8001	6.009	8572	0.157
5384	0.050	6739	0.011	8002	6.009	8614	3.000
5386	0.051	6741	1.086	8003 8004	6.009 6.009	8618	0.143
5387	0.007 0.103	6742	0.019	8005	6.009	8619 8620	3.025
5389 5391	0.105	6774-1	0.053	8006	6.009	8621	3.027 3.023
5392	2.013	6780 6783	0.055	8009	6.009	8625	0.161
5395	0.099	6784	6.007	8010	6.025	8626	0.185
5396	0.021	6766	0.097	8011	6.039	8675	2.029
5397	0.023	6800	6.029	8012	6.045	8676	2.011
5416	0.121	6806	6.027	8013	6.025	8686	0.143
5417	0.147	6807	6.029	8014	6.039	8695	0.109
5418	0.101	6809	2.030	8019	6.025 6.039	8696	0.143
5424	0.177	6310	6.029	8028 8030	6.005	8697	0.024
5425 5428	0.111 1.073	6811	6.029	8031	6.005	8731 8734	1.107
5429	1.027	6812 6814	6.029 6.029	8032	6.005	8753	0.143 0.143
5430	6.007	6815	6.029	8033	6.005	8754	0.143
5431	0.133	6816	6.029	8035	6.005	8800	0.143
5432	6.007	6818	6.029	8040	3.013	8801-2	0.143
5439	0.179	6820	6.003	8045	6.035	8810	0.143
5474	0.169	6821	6.029	8055	6.019	8818	0.043
5480	0.013	6822	6.003	8060	6.031	8842	3.035
5463	0.001	6823	6.003	8126	0.073	8885	6.003
5488	0.155	6824	0.029	8186 8246	0.071 2.007	8892	0.046
5489 5491	0.157 0.055	6827	6.029	8253	2.038	8915	1.009
5495	2.019	6830 6831	6.003	8264	1.088	8916 8917	1.013 1.019
5496	2.037	6832	6.001	8266	1.109	8918	1,051
5500	2.035	6834	6.003	8283	1.086	8919	1.061
5741	0.071	6836	6.003	8299	6.029	8920	1.063
5851	0.113	6840	0.031	8300	6.011	8921	1.069
5867	1.003	6841	0.031	8301	2.005	8930	0.049
5943	0.131	6842	0.031	8302	2.001 1.075	8990	0.145
6016	0.115	6843	0.025	8363 8380	2.016	8998	5.025
60 18 60 19	0.053 0.011	6848 6854	6.003 6.003	8394	0.153	9030	1.088 1.088
6047	0.005	6856	0.035	8395	0.032	9032	1.088
6123	0.003	6860	0.025	8397	0.143	9033	1.088
6133	0.167	6872	6.003	8398	0.143	9034	1.088
6197	1.087	6875	6.003	8399	0.143	9036	1.088
6218	3.031	6877	6.003	8407	0.143	9040	0.052
6219	3.033	6881	0.165	8414	0.069	9045	2.026
6220	3.017	6901	6.011	8419 8428	1.091 1.057	9048	1.150
6227-A 6268-1	0.143 1.103	6902	6.011	8430	1.021	9049 9050	1.150
6364	0.033	6903 6904	6.011 6.011	8431	1.035	9052	1.150 0.149
6375	0.045	6906	6.011	8432	1.015	9064	1.124
6378	2.031	6906	0.039	8433	1.011	9066	0.088
6431	0.129	6907	6.011	8434	1.053	9069	1.077
6433	0.107	6908	6.011	8435	1.007	9070	1.113
6504	3.009	6909	6.011	8437	1.039	9082	1.091
6507	3.005	6920	6.011	8440	1.017	9101	1.150
6512	3.003	6921	6.011	8441	1.029	9110	0.011
6513	3.001	6923	6.011	8442 8443	1.033 1.037	9116	2.032
6522	3.021 3.019	6930	6.015	8449	1.031	9117	2.024
6525 6572	0.053	6946 6956	6.011 0.119	8450	1.065	9118 9129	2.028 0.015
6578	0.053	6958	6.042	8451	1.067	9196	0.100
6591	0.163	6966	6.041	8453	1.049	9197	0.143
6592	0.068	6970	0.117	8454	1.055	9202	0.154
6596	0.043	6975	0.027	8475	0.149	9203	0.154
6620	0.095	6980	6.013	8480	0.151	9204	0.154
6622-1	1.005	6981	6.013	8481	0.151	9205	0.154
6624	2.009	6982	6.013	8482	0.155	9206	0.016
6626	0.089	6983	6.013	8483	0.155	9208	0.143

EMERY ENGINEERING CORPORATION

Group No.	Part No. No. Description Req.
0.001	Ball Bearing - Crankshaft - Engine 5483 Ball Bearing - N.D. 3206 Crankshaft (All Model 600 Engines)
0.003	Ball Bearing Snap Ring - Crankshaft - Engine 6123 Ball Bearing Snap Ring - Crankshaft (All Model 600 Engines)
0.005	Blower Back Plate - Engine 6047 Blower Back Plate (All Mode's))600 Engines) (All Mode's 600 Engines)
0.007	Blower Housing Assembly - Engine 5387 Blower Housing Assembly (All Model 600 Engine
0.011	Bolt - Bearing Housing to Crankcase - Engine 6739
	6739 2 Bolt - Bearing Housing to Crankcase - 5/16" - 24 x 1½" Model 6 0C Engines (All Rope Starters)
	9110 3 Bolt - Bearing Housing to Crankcase (All Model 600 Engines) 6019 1 Bolt - Bearing Housing to Crankcase - 5/16" - 24 x 2-3/8" Model 600 Engine (All Foot Starters)
	6649 Bolt - Starter Pedal Hub \(\frac{1}{2} - 20 \times 2 \frac{1}{2} \) Model 600 Engine (All Foot Starters)
0.013	Breather Baffle - Engine 5480 Breather Baffle (All Model 600 Engines)
0.015	Breather Valve Assembly - Engine 5371 Breather Valve Assembly (All Mudel 600 Engines)
0.016	Hex Head Plug - Air Baffle 9206 Hex Head Plug - Air Baffle - 1/8" (All Model 600 Scooter Engines)
0.019	Camshaft & Gear - Engine 6742 Camshaft and Gear (All Model 600 Engines)
0.021	Camshaft Spindle - Engine 5396 Camshaft Spindle (All Model 600 Engines)
0.023	Camshaft Spindle Hole Plug - Engine 5397 Camshaft Spindle Hole Plug (All Model 600 Engines)
0.024	Camshaft Spindle Hole Cap - Engine 8697 Camshaft Spindle Hole Cap (All Model 600 Engines)
0.025	Cap Screw - Case to Base - Engine 2 Cap Screw - Case to Base - 5/16" - "8 x 3½" (All Model 600 Engines) 4 Cap Screw - Case to Base - 5/16" - 24 - 4" (All Model 600 Engines)
0.027	Cap Screw - Hex Head - 011 Pump - Engine 6975 2 Cap Screw - Hex Head - 4" - 28 x I" (All Model 600 Engines)
>0.031	Cap Screw Cylinder Head - Engine 6840 3 Cap Screw Cylinder Head 5/16" - 18 x 14" Model 600 Engine (Scooter)
	6840 2 Cap Screw Cylinder Head 5/16" - 18 x 14" Model 600 Engine (Industrial Engine) (Power Package Unit)
	6841 3 Cap Screw - Cylinder Head 5/16" - 18 x 1-3/4" (All Model 600 Engines)
	6842 2 Cap Screw Cylinder Head 5/16" - 18 x 24" Model 600 Engine Engine (Scooter)
	6842 3 Cap Screw Cylinder Head 5/16" - 18 x 24" Model 600 Engine (Industrial) (Power Package Unit)

Group No.	Part No. No. Description	
0.032	Washer - Cylinder Head - Engine	
	8395 8 Washer - Cylinder Head (All Model 600 Engines)	
0.033	Connecting Rod Assembly - Engine	
	9262 Connecting Rod Assembly (All Model 600 Engines)	
0.034	Spacer - Cylinder Head - Engine	
	6592 2 Spacer Cylinder Head (All Model 600 Engines)	
0.035	Bolt - Connecting Rod - Engine	
	6856 2 Bolt - Connecting Rod (All Model 600 Engines) 5/16" - 24 x 1½"	
0.037	Connecting Rod Bolt Lock Washer - Engine	
	5364 2 Connecting Rod Bolt Lock Washer (All Model 600 Engines)	
0.039	Connecting Rod - Hex Nut - Engine	
	6906 2 Connecting Rod - Hex Nut (All Model 600 Engines)	
0.041	Crankcase - Engine	
	8545 Crankcase (All Model 600 Engines)	
0.043	Crankshaft Assembly - Engine	
	8818 1 Crankshaft Assembly - Model 600 Engines (Scooter)	
	(Power Package Unit) 1 Crankshaft Assembly - Model 600 Industrial Engine	
0.005	model ood madsirial Engine	
0.045	Gear - Crankcase - Engine 6375 Gear - Crankcase (All Model 600 Engines)	
0.000	(ATT Model 600 Eligines)	
0.046	Dowell Pin - Crankshaft Gear - Engine 8892 Dowell Pin - Crankshaft Gear (All Model 600 Engines)	
0.047	orankonare dear (All Model 600 Engines)	
0.01/	Cylinder Assembly - Engine 5380 Cylinder Assembly - Including Valve Stem Guides and Sub-	
	5380 Cylinder Assembly - Including Valve Stem Guides and Exhaust Valve Seat (All Model 600 Engines)	
0.049	Cylinder Head - Engine	
	8938 1 Cylinder Head (All Model 600 Engines)	
0.050	Cylinder Head Cover - Engine	
	5384 Cylinder Head Cover (All Model 600 Scooter Engines)	
0.051	Cylinder Jacket - Engine	
	5386 Cylinder Jacket (All Model 600 Engines)	
0.052	Air Baffle - Engine	
	9040 Air Baffle (Model 600 Scooter Engines)	
0.053	Engine	
	6018 Engine Assembly (All Model 85 Scooters)	
	6572 Engine Assembly (Industrial)	
	6774 Engine Assembly (Power Package Unit)	
.055	Engine Base Assembly	
	5491 Engine Base Assembly (Model 600 Engine - Scooter	
0.00	6780 Engine Base Assembly ((Industrial - Power Package Unit)	
.069	Expansion Plug - Foot Starter Pivot Bolt Hole - Engine	
	8414 Expansion Plug - Foot Starter Pivot Bolt Hole (All Model	
.071	600 Engines). Flywheel - Engine	
	6635 Flywheel - Plain (All Model 600 Engines)	
	8186 Flywheel & Generator Magnet Assembly (All Model 600 Engines)	



Group No.	Part No. No. Description
0.073	Foot Starter Clevis Pin
	8126 Foot Starter Clevis Pin (All Model 600 Engines
0.075	Foot Starter Gear Segment Assembly 6629 Foot Starter Gear Segment Assembly (All Model 600 Engines with Foot Starters)
0.077	Foot Starter Hub Bearing 6646 Foot Starter Hub Bearing (All Model 600 Engines with Foot Starters)
0.083	Foot Starter Mounting Bracket 6637 Foot Starter Mounting Bracket (All Model 600 Engines with Foot "Starters)
0.085	Foot Starter Mounting Bracket Spacer 6643 Foot Starter Mounting Bracket Spacer (All Model 600 Engines with Foot Starters)
0.087	Foot Starter Pedal Assembly Complete 6651-2 Foot Starter Pedal Assembly Complete - Model 600 Engines (Scooter) (Power Package Unit)
0.088	Foot Starter Clevis Pin 9066 Foot Starter Clevis Pin (All Model 85 Scooters)
0.089	Foot Starter Pedal Pad Assembly 6626 Foot Starter Pedal Pad Assembly (Model 600 Engines with Foot Starter)
0.093	Foot Starter Pedal Sub-Assembly 6650 Foot Starter Pedal Sub-Assembly Model 600 Engine (Scooter) (Power Package)
0.095	Foot Starter Pinion Gear 6620 Foot Starter Pinion Gear (All Model 600 Engines Equipped with Foot Starter)
0.097	Foot Starter Return Spring 6766 Foot Starter Return Spring (Scooter) (Power Package Unit)
0.099	Gasket - Bearing Housing to Crankcase 5395 Gasket - Bearing Housing to Crankcase (All Model 600 Engines)
0.100	Assorted Gasket Set 9196 Assorted Gasket Set (All Model 600 Engines)
0.101	Gasket - Case to Base - Engine 5418 Gasket - Case to Base (All Model 600 Engines)
0.103	Gasket - Cylinder Head - Engine 5389 Gasket - Cylinder Head (All Model 600 Engines)
0.105	Gasket - Cylinder to Case - Engine 5391 Gasket - Cylinder to Case (All Model 600 Engines)
0.107	Gasket - Oil Filler Cap - Engine 6433 Gasket - Oil Filler Cap (All Model 600 Engines)
0.109	Gasket - Oil Pump to Crankcase - Engine 8686 Gasket - Oil Pump to Crankcase (All Model 600 Engines)
0.111	Gasket - Valve Spring Cover - Engine 5425. Gasket - Valve Spring Cover (All Model 600 Engines)
0.113	Main Bearing Assembly - Sleeve Type - Engine 1 Main Bearing Assembly - Sleeve Type (All Model 600 Engines) 1 Insert - Main Bearing

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Part No.
Group No.
                                              Description
                    Req.
 0.115
           Main Bearing Housing - Engine
                     I Main Bearing Housing (All Model 600 Engines)
           6016
 0.119
          Nut - Tinnerman - Blower Housing - Engine
                    2 Nut - Tinnerman - Blower Housing (All Model 600 Engines)
 0.121
           Oil Drain Plug - Engine
                    I Oil Drain Plug (All Model 600 Engines)
          5416
 0.127
          Oil Filler Cap Assembly - Engine
                    I Oil Filler Cap Assembly (All Hodel 600 Engines)
          6702
          Lock Wire - Oil Filler Cap - Engine
 0.129
                    I Lock Wire - Oil Filler Cap (All Model 600 Engines)
          6431
          Oil Gauge Shield Guide - Engine
 0.131
          5943
                    I Oil Guage Shield Guide (Industrial & Power Package Unit)
          011 Level Gauge - Engine
 0.133
                    I Oil Level Guage (All Model 600 Engines)
          5431
          0il Level Gauge Felt Washer - Engine
 0.135
          8518
                    I Oil Level Gauge Felt Washer (All Model 600 Engines)
          Oil Level Gauge Guide - Engine
 0.137
                    I Oil Level Gauge Guide (All Model 85 Scooters)
          8515
          Oil Pump Assembly - Engine
 0.143
                    I Oil Pump Assembly (All Model 600 Engines)
          8801-2
                    I Snap Ring - Oil Pump Main Drive (All Model 600 Engines) Engines)
          8618
                    I Lock Plate - 011 Pump (All Model 600 Engines)
          8695
                    2 Dowell Pin - Oil Pump Case (Al! Model 600 Engines)
          8696
                    I Oil Pump Housing - Aluminum (All Model 600 Engines)
          8734
          8753
                    I Gear Idler - Oil Pump (All Model 600 Engines)
                    2 Washer - Bronze - .020 - 011 Pump (All Model 600 Engines)
          6227-A
                    I Dee Drive Gear - Oil Pump - Steel (All Model 600 Engines)
          8754
                    I Spring - Relief Valve - Oil Pump (All Model 600 Engines)
          8800
                    I Gear & Shaft Main Drive - Oil Pump (All Model 600 Engines)
          8810
                   I Oil Pump Repair Kit (All Model 600 Engines)
          9197
                   I Busing - Oil Pump'- Main Drive Shaft (All Model 600 Engines)
          8397
                   1 Steel Cover - Oil Pump (All Model 600 Engines)
          8398
                   I 011 Pump Cover (All Model 600 Engines)
          8399
          8407
                    I Cup - Relief Valve (All Model 600 Engines)
          9208
                   I Thrust Washer "D" - Oil Pump (All Model 600 Engines)
         011 Seal - Crankshaft - For Sleeve Bearing and Ball Bearing - Engine
0.145
         8990
                      Oil Seal - Crankshaft - For Sleeve Bearing and Ball Bearing
                         (All Model 600 Engines)
0.147
         Oil Strainer - Engine
         5417
                   I Oil Strainer (All Model 600 Engines)
0.149
         Piston - Engine
                      Piston - Standard (All Model 600 Engines)
         9052
                      Piston - Oversize .010 (All Model 600 Engines)
         8477
         8478
                      Piston - Oversize .020 (All Model 600 Engines)
                   I Piston - Oversize .030 (All Model 600 Engines)
         8475
0.151
         Piston Pin - Engine
                    Piston Pin - Standard (All Model 600 Engines)
         5378
         8480
                      Piston Pin - Oversize .003 (All Model 600 Engines)
                      Piston Pin - (All Model 600 Engines) oversize .006
         8481
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Group No.	Part No. No. Description
0.153	Piston Pin Lock Ring - Engine
- '	8394 2 Piston Pin Lock Ring (All Model 600 Engines)
0.154	Piston Ring Set - Engine
	9202 Piston Ring Set - Standard (All Model 600 Engines)
	9203 Piston Ring Set - Oversize .010 (All Model 600 Engines)
· ·	9204 Piston Ring Set - Oversize .020 (All Model 600 Engines)
	9205 Piston Ring Set - Oversize .030 (All Model 600 Engines)
0.155	Piston Ring Compression - Engine
	5488 2 Piston Ring Compression - Standard (All Model 600 Engines)
	8482 2 Piston Ring Compression - Oversize .010 (All Model 600 Engines)
	8483 2 Piston Ring Compression - Oversize .020 (All Model 600 Engines)
	8570 2 Piston Ring Compression - Oversize .030 (All Model 85 Engines
0.157	Piston Ring Oil Control - Engine
	5489 Piston Ring Oil Control Standard (All Model 600 Engines)
	8484 Piston Ring Oil Control Oversize .010 (All Model 600 Engines)
	8485 Piston Ring Oil Control Oversize . 020 (All Model 600 Engines)
	8572 I Piston Ring Oil Control Oversize .030 (All Model 600 Engines)
0.159	Plate - Main Bearing Retainer - Engine
	5366 Plate - Main Bearing Retainer (All Model 600 Engines)
0.161	the state of the s
0.101	Rope Starter 8625 Rope Starter (Model 600 Industrial Engines)
0.163	Rope Starter Pulley
	6591 Rope Starter Pulley (Model 600 Industrial Engines)
0.165	Screw P. K. Blower Housing - Engine
	6881 2 Screw P.K. Blower Housing 3/8" (All Model 600 Engines
0.167	Stud - Backing Plate to Crankcase - Engine
	6133 4 Stud - Backing Plate to Crankcase (All Model 600 Engines)
0.169	Stud - Cylinder to Crankcase - Engine
	5474 4 Stud - Cylinder to Crankcase 3/8" x 13" (All Model 600 Engines)
0.171	Valve Exhaus't - Engine
0.171	5351 Valve Exhaust (All Model 600 Engines)
0.172	2000년 1일
0.173	Valve Inlet - Engine
	5350 J Valve Inlet (All Model 600 Engines)
0.175	Valve Seat Insert Exhaust - Engine
	5352 Valve Seat Insert Exhaust (All Model 600 Engines)
0.177	Valve Spring Cover - Engine
	5424 Valve Spring Cover (All Model 600 Engines)
0.179	Valve Spring - Engine
	5439 2 Valve Spring (All Model 600 Engines)
0.181	Valve Spring Seat - Engine
	5354 2 Valve Spring Seat (All Model 600 Engines)
0.183	Valve Spring Seat Lock - Engine
01100	5356 2 Valve Spring Seat Lock (All Model 600 Engines)
0.105	
0.185	Valve Stem Guide - Engine 8626 2 Valve Stem Guide (All Model 600 Engines)
0.100	
0.187	Valve Tappet - Engine
	5358 2 Valve Tappet (All Model 600 Engines)

Group Mo.	Part No. No. Description
1.003	Carbureter Air Filter
	5867 Carbureter Air Filter (All Model 600 Engines)
1.005	Carbureter Assembly
	6622-1 Carbureter Assembly - V.H. 26 (All Model 600 Engines)
1.007	Carbureter Assorted Gasket Set
	8435 Carbureter Assorted Gasket Set - V. H. 26 (All Model 600 Engines)
1.009	Carbureter Body Assembly
	8915 Carbureter Bocy Assembly - V.H. 26 (All Model 600 Engines)
1.011	Carbureter Body to Bowl Gasket
1.011	8433 Carbureter Body to Bowl Gasket - V.H. 26 (All Model 600 Engines)
1 010	
1.013	Carbureter Bowl Nut
	8916 Carbureter Bowl Nut - V.H. 26 (All Model 600 Engines)
1.015	Carbureter Bowl Nut Gasket
	8432 Carbureter Bowl Nut Gasket - V.H. 26 (All Model 600 Engines)
1.017	Carbureter Choke Fly
	8440 Carbureter Choke Fly - V.H. 26 (All Model 600 Engines)
1.019	Carbureter Choke Shaft Assembly
	8917 Carbureter Choke Shaft Assembly (All Model 600 Engines)
1.021	Carbureter Choke Shaft Screw
	8430 Carbureter Choke Shaft Screw - V.H. 26 (All Model 600 Engines)
1.023	Carbureter Elbow
	6696 Carbureter Elbow V.H. 26 (All Model 600 Engines)
1.027	Gasket Carbureter to Engine
1.027	5429 Gasket Carbureter Elbow to Engine (All Model 600 Engines
1 000	
1.029	Carbureter Float & Lever Assembly 8441 Carbureter Float & Lever Assembly V.H. 26 (All Model 600 Engines)
1.031	Carbureter Float Bowl
	8849 Carbureter Float Bowl - V.H. 26 (All Model 600 Engines)
1.033	Carbureter Float Lever Shaft
	8442 Carbureter Float Lever Shaft - V.H. 26 (All Model 600 Engines)
1.035	Carbureter Float Valve Seat Gasket
	8431 Carbureter Float Valve Seat Gasket - V.H. 26 (All Model 600 Engines)
1.037	Carbureter Idle Adjusting Needle
	8443 Carbureter Idle Adjusting Needle - V.H. 26 (All Model 600 Engines)
1.039	Carbureter Idle Adjusting Needle Spring
	8437 Carbureter Idle Adjusting Needle Spring -V.H. 26 (All Model 600 Engines)
1.049	Carbureter Matched Float Valve & Seat
1	8453 Carbureter Matched Float Valve & Seat V.H. 26 (All Model 600 Engines)
1.051	Carbureter Nozzle Assembly
1.001	8918 Carbureter Nozzle Assembly - V.H. 26 (All Model 600 Engines)
1.050	
1.053	Carbureter Nozzle Gasket 8434 Carbureter Nozzle Gasket - V.H. 26 (All Model 600 Engines)
1.055	Carbureter Package Repair Kit
	8454 Carbureter Package Repair Kit - V.H. 26 (All Model 600 Engines)
1.057	Carbureter Throttle Adjusting Screw
	8428 Carbureter Throttle Adjusting Screw - V.H. 26 (All Model 600 Engines)

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Group No. Part No. No.
                                               Description
                    Req.
1.06
         Carbureter Throttle Fly
                   I Carbureter Throttle Fly - V.H. 26 (All Model 600 Engines)
1.063
          Carbureter Throttle Shaft Assembly
                   I Carbureter Throttle Shaft Assembly V.H. 26 (All Model 600 Engines)
         Carbureter Throttle Shaft Lock Washer
1.065
                   I Carbureter Throttle Shaft Lock Washer (All Model 600 Engines)
         8450
1.067
         Carbureter Throttle Shaft Mut
                   I Carbureter Throttle Shaft Nut V.H. 26 (All Model 600 Engines)
         Carbureter Throttle Shaft Screw
1.069
                   I Carbureter Throttle Shaft Screw V.H. 26 (All Model 600 Engines)
1.073
         Gasket - Carbureter to Elbow
                  I Gasket - Carbureter to Elbow (All Model 600 Engines)
1.075
         Choke Control Assembly
                I Choke Control Assembly - Model 600 Industrial & Power Package Unit
         Exhaust Nipple
1.077
         9069
                  I Exhaust Mipple (All Model 600 Engines)
1.086
         Fuel Pump
                   I Fuel Pump (All Model 600 Engines)
         6741
                   I Gasket - Fuel Pump (All Model 600 Engines)
         8266
1.087
         Gasoline Filter
         6197
                   I Gasoline Filter
1.088
         Gasoline Filter Bowl
         9030
                   I Gasoline Filter Bowl
         9031
                   I Gasket - Basoline Filter Bowl
         9032
                  1 Screen - Gasoline Filter
         9033
                   Needle & Packing Assembly - Gasoline Filter
                   I Tube Elbow - 3/16" - Fuel Pump (All Model 600 Engines)
         8264
         9034
                      Bowl Retainer Bracket - Gasoline Filter
         9036
                   I Body - Gasoline Filter
1.089
         Gasoline Line Assembly
                  1 Gasoline Line Assembly - (Industrial Engine) only.
1.091
         Gasoline Tank
         8419
                   I Gasoline Tank Installation Kit 10" - Model 600 Engines - Power
                        Package - Industrial
         6713-1 | Gas Tank (All Model 600 Industrial Engines)
         9082
                   2 Gasoline Tank Pads
                                           (Model 600 Industrial Engine)
         Gasoline Tank Bracket Assembly
1.093
         8504
                   I Gasoline Tank Bracket Assembly (Industrial & Power Package Unit)
1.103
         Gasoline Tank Filler Cap
         6268-1
                   I Gasoline Tank Filler Cap (Model 600 Industrial Engine)
1.107
         Gasoline Tank Straps
         8731
                   2 Gasoline Tank Straps - Oval Tank 10" (Model 600 Engines) (Industrial)
                        (Power Package Unit)
         Muffler
1.109
         8283
                      Muffler - Model 600 Engine (Industrial) (Power Package Unit)
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1.113	9070 Exhaust Pipe Clamp (All Model 85 Scooters)
1.124	
	Throttle & Choke Control Assembly Kit
1.150	Throttle & Choke Control Assembly Kit (Model 600 Industrial Engine) Throttle Control 9048 Throttle Control (Model 600 Industrial Engine) 9049 Throttle Control Busing (Model 600 Industrial Engine) 9050 Spring - Throttle Control (Model 600 Industrial Engine) 9101 Throttle Control Spring (Model 600 Industrial Engine)
2.001	Flywheel Armature Insulating Washer
	8302 Flywheel Armature Insulating Washer 3" 0.D. x 3/16" I.D. x .06 Thick (All Model 600 Engines
2.003	Flywheel Armature Mounting Clip 6660 3 Flywheel Armature Mounting Clip (All Model 600 Engines)
2.005	Flywheel Armature Steeped Insulating Washer 8301 Flywheel Armature Steeped Insulating Washer (All Model 600 Engines)
2.007	Flywheel Generator Armature Assembly 8246 Flywheel Generator Armature Assembly (All Model 85 Scooters)
2.009	Flywheel Generator Magnet Assembly 6624 Flywheel Generator Magnet Assembly (All Model 600 Engines)
2.011	Gasket - Magneto Cover 8676 Gasket - Magneto Cover - F.M. VMJIB78 (All Model 600 Engines)
2.013	Gasket - Magneto to Engine 5392 Gasket - Magneto to Engine (All Model 600 Engines)
2.016	Short Circuit Lever - Magneto 8380 I Short Circuit Lever - Magneto (Model 600 Engines)
2.019	Magneto 5495 Magneto - Fairbanks Morse VMJIB78
2.021	Magneto & Gear Assembly 6783 Magneto & Gear Assembly (All Model 600 Engines)
2.024	Magneto Coil Assembly 9117 Magneto Coil Assembly (All Model 600 Engines)
	Magneto Breaker Point Set 2437 Magneto Breaker Point Set - Fairbanks Morse FMJIB78 (600 Engines)
2.026	Magneto Ground Wire Assembly 9045 Magneto Ground Wire Assembly (All Model 600 Engines)
	Magneto Condenser 2433 Magneto Condenser - Fairbanks Morse FMJIB78
	Flat Washer - Magneto 9118
2.029	Magneto Cover B675 Magneto Cover - Fairbanks Morse VMJIB78 (All Model 600 Engines)
	Screw - Magneto Cover 6809 4 Screw - Magneto Cover - #10 - 24 x 5/8" (All Model 600 Engines)

Group No.	Part No. No. Description Req.	
2.031	Magneto Gear 6378 Magneto Gear (All Model 600 Engines)	
2.032	Magneto Impulse Spring 9116 Magneto Impulse Spring (All Model 600 Engines)	
2.035	Spark Plug 5500 Spark Plug (All Model 85 Scooters) 8488 Spark Plug - (Industrial & Power Package Unit)	
2.037	Spark Plug Wire Assembly 5496 Spark Plug Wire Assembly (All Mcdel 600 Engines)	
2.038	Spark Plug Clip 8253 Spark Plug Clip (All Model 85 Scooters)	
3.000	Governor Assembly 8614 Governor Assembly (All Model 699 Engines) 600	
3.001	Governor Adjusting Nut 6513 Governor Adjusting Nut (All Model 600 Engines)	
3.003	Governor Adjusting Screw 6512 Governor Adjusting Screw (All Model 600 Engines)	
3.006	Governor Bracket 6507 Governor Bracker (All Model 600 Engines)	
3.009	Governor Carrier Assembly 6504 Governor Carrier Assembly (All Model 600 Engines)	
3.013	8040 Governor Groove Pin (All Model 600 Engines)	
3.017	Governor Plunger 6220 Governor Plunger (All Model 600 Engines)	
3.019	Governor Shaft Assembly 6525 Governor Shaft Assembly (All Model 600 Engines)	
3.021	Governor Shaft Guide Bushing 6522 Governor Shaft Guide Bushing (All Model 600 Engines)	
3.023	Governor Spring - Tension 8621 Governor Spring - Tension (All Model 600 Engines)	
3.025	Governor Throttle Arm Assembly 8619 Governor Throttle Arm Assembly (All Model 600 Engines)	
3.027	Governor Throttle Wire to Carbureter 8620 Governor Throttle Wire to Carbureter (All Model 600 Engines)	
3.031	Governor Weight 6218 2 Governor Weight (All Model 600 Engines)	
3.033	Governor Weight Carrier 6219 Governor Weight Carrier (All Model 600 Engines)	
3.035	Governor Weight Pin 8842 2 Governor Weight Pin (All Model 600 Engines with Governor)	
5.025	Decalcomania - Blower Housing 8998 Decalcomania - Blower Housing (All Model 600 Engines)	
6.001	Cap Screw - Flat Head - Slotted 6832 Cap Screw - Flat Head - Slotted 1/4 - 28 x 7/8"	1000

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Description
Group No.
           Part No.
                     No.
 6.003
           Cap Screw
                        Cap Screw 4" - 20 x 2"
           6820
           6822
                        Cap Screw - Hex. Head 1/4 - 20 x 5/8"
           6823
                        Cap Screw - Hex. Head # - 20 - 3"
          6830
                        Cap Screw - Hex. Head 1/4 - 28 x 1/2"
           6831
                        Cap Screw - Hex. Head - Engine # - 28 x 5/8"
           6834
                        Cap Screw - Hex. Head 1/4 - 28 x 11/4"
           6836
                        Cap Screw - Hex. Head - Engine # - 28 x 12"
           6848
                        Cap Screw - Hex. Head 5/16 - 24 - 14"
          6854
                        Cap Screw - Hex Head 5/16 - 24 x 1"
          6872
                        Cap Screw - Hex Head 3/8" - 24 x 14"
          6875
                        Cap Screw - Hex. Head 3/8" - 24 x 2-3/4"
          6877
                        Cap Screw - Hex. Head 3/8 - 16 x 2"
          8885
                        Screw - Hex Head 5/15"
 6.005
          Cotter Pin
          8030
                        Cotter Pin - 1/16" x 2"
                        Cotter Pin - 1/16" x 3/4"
         8031
                        Cotter Pin - 1/16" x 7/8"
          8032
                        Cotter Pin - 3/32" x 1/2"
          8033
          8035
                        Cotter Pin - 1/8" x 1-1/8"
 6.007
          Fiber Washer
                     3 Fiber Washer - Oil Pump - Valve Cover (All Model 600 Engines)
          5430
                     I Fiber Washer - Oil Drain Plug - Engine (All Model 600 Engines)
          5432
          6784
                        Fiber Washer - Governor Hole Plug (All Model 600 Engines)
 6.009
          Flat Washer
                        Flat Washer - 4" I.D. 9/16" O.D. 3/64" Thick
          8000
                       Flat Washer - 5/16" I.D. 3/4" O.D. 1/16" Thick
          1008
          8002
                        Flat Washer - 11/32" 1.D. 11/16" 0.D. 1/16" Thick
                       Flat Washer - Cad. Plated - 3/8" - 13/32" 1.D. x 13/16" 0.D.
          8003
                        Flat Washer - 17/32" I.D. I-1/6" O.D. 3/32" Thick
          8004
          8005
                       Flat Washer - 13/16" 1.D. 1\frac{1}{2}" 0.D. 1/8" Thick
                        Flat Washer - 3/16" 1.D. 7/16" 0.D. 3/64" Thick
          8006
          8009
                       Flat Washer - 9/32" 1.D. 5/8" 0.D. 4" Thick
 6.011
          Hex Nut
          6901
                       Hex Nut - 3/16"
          6902
                       Hex Nut - 3/16" - 32 Plain
          6903
                       Hex Nut - 4" - 20 Plain
          6904
                       Hex Nut - 4" - 28 Plain
          6906
                       Hex Nut - 5/16" - 24
          6907
                       Hex Nut - 3/8" - 16 Plain
          6908
                       Hex Nut - 3/8" - 24 Plain
          6909
                       Hex Nut - 7/16" - 20 Plain
                       Hex Nut - 1" - 20 (Jam) Crankshaft (All Model 600 Engines)
          6920
                       Hex Nut - 7/8" - 14 (Jam) (Flywheel All Model 600 Engines)
          6921
                       Hex Nut - 5/16" - 24 (Jam)
          6923
                       Hex Nut - 3/4" - 16 -
          6946
          8300
                       Hex Nut - Brass - 5/32 - 32
 6.013
          Lock Washer
          6980
                       Lock Washer - 3/15" - Governor Carrier
          6981
                       Lock Washer - "
          6982
                  Lock Lock Washer - 5/16"
          6983
                       Lock Washer - 3/8"
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ALL MODEL 600 ENGINES

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Group No. Part No.
                                          Description
                     Req.
           6984
                        Lock Washer - 7/16"
           6985
                        Lock Washer - 2"
           6986
                        Lock Washer - 5/32"
           6996
                        Lock Washer - Shakeproof - 5/16"
  6.015
           Palnut
           6930
                        Palnut - Parkerized - 1 - 20
  6.019
           Pipe Plug
           8055
                         Pipe Plug - 1/8" - 27 Standard (All Model 600 Engines)
  6.025
           Rivet - Flat Head
           8010
                     2 Rivet - Flat Head - 1/8" x 5/16" (All Model 600 Engines) (Baffle-Plate)
           8013
                        Rivet - Flat Head - 3/16" x 1/2"
           8019
                        Rivet - Flat Head - 9/64" x 3/8" Tube (All Model 85 Scooters)
  6.027
           Screw Fillister Head
           6806
                      I Screw Fillister Head - 9/64" - 32 x 5/16"
           Screw - Round Head Slotted
  6.029
           6800
                        Screw - Round Head Slotted 1/8" - 40 x 3/8"
                        Screw - Round Head Slotted 3/16 - 32 x 5"
           6807
           6810
                        Screw - Round Head Slotted 3/16" - 24 x 5/8"
                        Screw - Round Head Slotted 3/16" x #"
           6811
           6812
                        Screw - Round Head Slotted 3/16 - 32 x 3/8"
           6814
                        Screw - Round Head Slotted 3/16" - 32 x 3/4"
           6815
                        Screw - Round Head Slotted 3/16" x 34"
                        Screw - Round Head Slotted 3/16" - 24 x 14"
           6816
           6818
                        Screw - #10 - 24 x 3/4"
                        Screw - Round Head Slotted 4" - 20 x 2"
           6821
           6827
                        Screw - Round Head Slotted 1/4 - 20 x 3/8"
           8299
                        Screw - Round Head Slotted - Brass 5/32" - 32 x 5/8"
 6.031
           Set Screw (Headless)
           8060
                        Set Screw - Headless - 4" - 20 x 2"
 6.033
           Washer - Shakeproof
           6990
                        Washer - Shakeproof - 3/16" - Internal
           6991
                        Washer - Shakeproof - #" - Internal
                        Washer - Shakeproof - 5/16" - Internal
           6 992
                        Washer - Shakeproof - 3/8" - Internal
           6993
                        Washer - Shakeproof - 7/8" - Internal & External
           6995
           6997
                        Washer - Shakeproof - 5/16" - External
6.035
           Woodruff Key #11
           8045
                        Woodruff Key #11
6.039
           Rivet - Round Head
           1108
                        Rivet - Round Head - 3/16" x 3/8"
                        Rivet - Round Head - 3/16" x 3/4" (All Model 85 Scooters)
           8014
                           (Brake Drum & Sprocket)
           8019
                        Rivet - Flat Head - 9/64" x 3/8" Brake Shoe & Clutch Drum
                        Rivet - Round Head 1/4" x 7-8" Flywheel Magnet
           8028
 6.041
           Wing Nut
                        Wing Nut - 4" - 20
           6966
           Tee Nut
 6.042
                        Tee Nut - 5/16" x 24
            6958
           Rivet
 6.045
           8012
                        Rivet - Oval Head - 3/16" x 3/8"
```



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LUBRICATION MAINTENANCE FOR SALSBURY MODEL 600 ENGINE

LUBRICATION: An important feature in the design of the Salsbury engine is the pressure behind system which is shown in red on the reverse side of this page, with all important parts keyed for identification.

This system works in the following manner: Oil is drawn from the engine sump (A), through oil strainer (B), through suction line (C), by gear pump (D), and forced through drilled passages under pressure to main bearing (E), and connecting rod bearing (F). Crankshaft bearing (G), valve mechanism (H), timing gear (I), cylinder wall (J), and wrist pin (K), are lubricated by oil spray from main bearings (E) and connecting rod bearing (F). Oil gauge stick (L) extends down into the oil sump and is marked to indicate high and low oil levels. An oil pressure gauge connection is located at (M).

LUBRICATING OIL AND FUEL CHART: Although the engine oil and fuel requirements of this engine are similar to those of other engines operating in the same field of service, we are convinced that superior engine performance results from the use of high quality fuels and lubricants. Accordingly, we are listing in the following chart certain products which are manufactured by the Socony-Vacuum Oil Co., Inc., which are representative of the high quality standards we consider satisfactory for use in this engine. These products can be obtained internationally. These products, or products of like quality, should always be used.

Fuel

Mobilgas Gasoline Premium Gasoline Not Necessary

Lubricating Oil (For Atmospheric Temperatures)

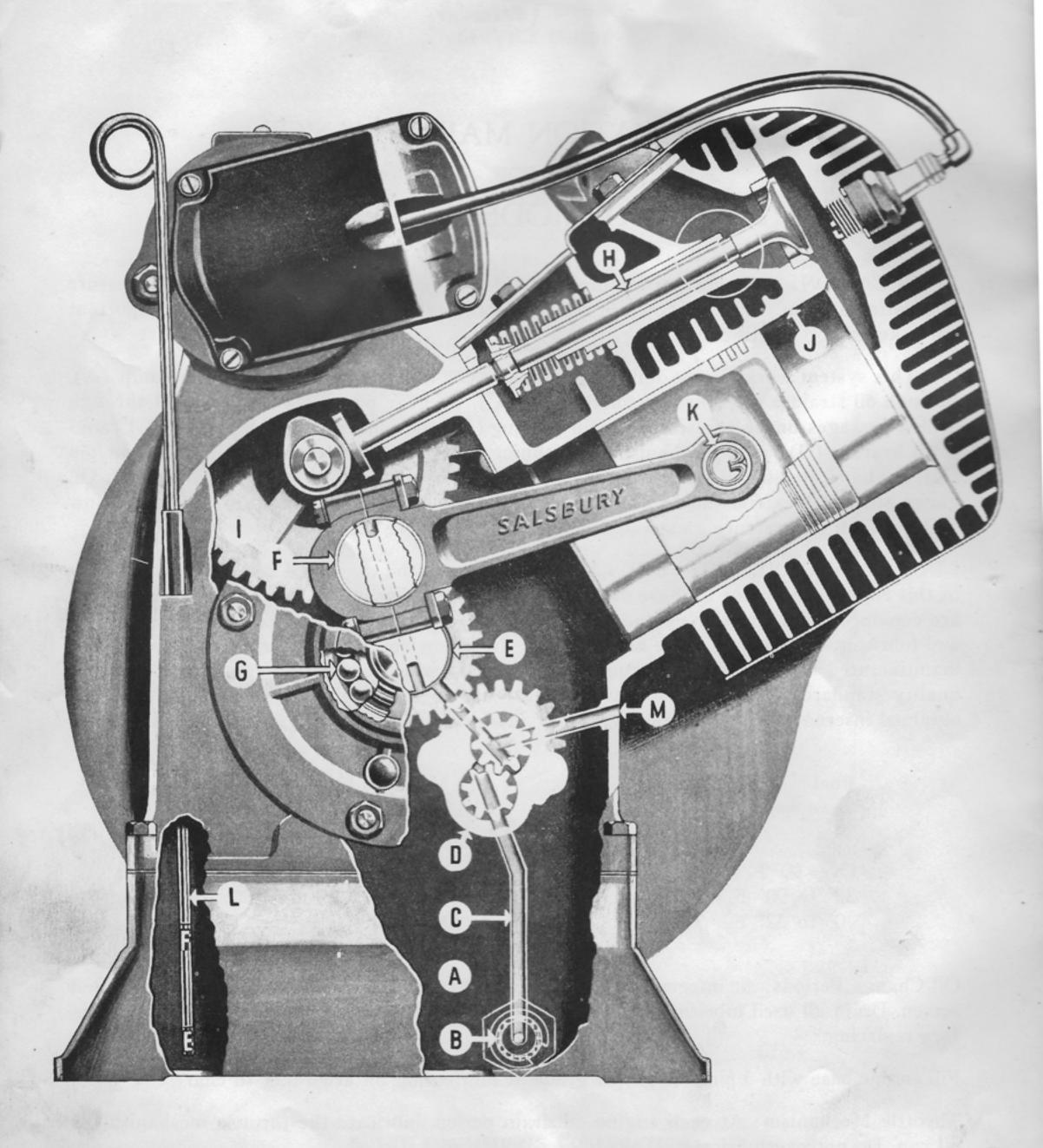
Over 90° F. 32° to 90° F. 0° to 32° F. Mobiloil AF (S.A.E. 40) Mobiloil A (S.A.E. 30) Mobiloil Arctic (S.A.E. 20)

Oil Change Periods: At intervals of 1000 miles or 40 operating hours, remove drain plug and screen. Drain all used lubricating oil from the engine sump and clean screen thoroughly before replacing.

Fill engine base with 3 pints of proper grade of lubricating oil according to chart.

Throttle Mechanism: At each engine oil drain period, lubricate the throttle mechanism by oil can. Do not overlubricate.







SPECIFICATIONS AND GENERAL ENGINE DATA

Engine bore 3" -- Stroke 2%".

Piston displacement 19.4 cubic inches.

Engine idling speed 850 to 1,000 R.P.M.

Recommended operating speed 2,650 R.P.M.

Engine cylinder is gray cast iron and constructed to permit reboring up to .060.

Aluminum allow piston

Aluminum alloy piston.

Aluminum alloy connecting rod.

Aluminum cylinder head gasket - can be reused. Do not file connecting rod caps. If adjustment, use new rod.

Valve guides are replaceable without reaming. Oil pump is a positive gear type and should not be overhauled in the field due to the fact that special jigs and tools are required. It is recommended that a new pump be installed.

Intake valve clearance .016 - cold.

Exhaust valve clearance .016 - cold.

Exhaust and Intake Valve Seats 45°

Piston clearance .0065 to .0075.

Piston pin fit in piston - heavy hand press fit.

Piston ring end gap clearance .007 to .012.

Piston pin fitin connecting rod - light hand press fit.

Connecting rod bearing clearance .001. to .0025. Connecting rod side clearance .0012 to .004. Cylinder head cap screw tension - 240 inch - pounds. Use torque wrench. Retighten after motor has been run and warmed up.

Magneto breaker point clearance .018.

Spark plug point clearance .030.

OPERATING INSTRUCTIONS

Starting

When starting an engine equipped with a foot starter

- Check engine oil before starting. Engine oil capacity - 3 pints.
- On Motor Scooter or other vehicles, always set brakes before starting engine.
- 3. Push down on foot starter twice with ignition key in off position, carbureter fully
- On Motor Scooter or other vehicles, always set brakes before starting engine.
- Push down on foot starter twice with ignition key in off position, carbureter fully choked and throttle partly open.
- Open choke turn ignition on push down on foot starter with throttle partly open.
- 5. Don't hold throttle wide open when starting.
- 6. Don't choke a hot engine.

When starting an engine equipped with a rope starter:

- 1. Close choke.
- Hold throttle partly open.
- 3. Spin engine with rope starter.

- 4. After engine has started, open choke.
- Do not choke engine to stop, use ground button on magneto or ignition switch.

Air Cleaner

The air cleaner should be removed and washed with clean gasoline periodically.

Engine break-in Period

Motor Scooter: Do not exceed 25 MPH during first 250 miles. 35 MPH during second 250 miles. For best performance, accelerate with full throttle but for continuous operation, cut back to 4throttle.

Industrial Engine: Engine should not be operated at more than 50% of capacity for first 10 hours. Not more than 80% of maximum power continually.

Carbureter

Model VH-26 carbureters are in use with the Salsbury Model 600 Engine. This carbureter contains a fixed main jet. The low speed jet is located on the upper right hand side of the carbureter; one half to three quarter turn open should be sufficient. To obtain desired idling speed, set the idle adjusting screw. (See Photo No. 1.) This screw is located on top of the carbureter next to the throttle arm.

To obtain proper gasoline level in Marvel VH-26 carbureters:

- Remove carbureter from engine.
- Remove bowl and hold carbureter in upright position with float raised and needle valve seated.
- The lowest point of the float should be ½" plus or minus 1/64" above the bottom of the main nozzle housing.
- To adjust, bend metal float arm with small pliers at point where arm contacts needle valve. (See Illustration No.6).

Engine Valves

Intake valve clearance .016 -- cold. Exhaust valve clearance .016 -- cold.

These adjustments are accomplished by grinding off the lower ends of the valve stems. (See Photo No. 2).

Timing and Checking Valves

With cramkshaft removed and camshaft in position:

- Turn until arrow on camshaft gear points to dead center of the main bearing.
- 2. Install gasket on bearing plate side.
- Insert crankshaft until gear contacts the camshaft gear with crankshaft crank in upper dead center position.
- Turn crankshaft slowly in direction of camshaft until gear teeth can be engaged.
- 5. Push crankshaft completely into position.

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To Check Valve Timing:

- Set cam gear arrow to point directly to dead center of the crankshaft. With arrow in this position, crankshaft should be in upper dead center.
- Turn crankshaft back and forth a few degrees and watch the intake and exhaust valve lifters. If valve timing is correct, the valve lifters will lift alternately.
- Tighten the main bearing plate bolts alternately on opposite sides of the face until all nuts are tight.

Magneto

The Salsbury Model 600 Engine is equipped with an externally mounted high tension magneto and impulse starting coupler.

. Adjusting Magneto Points

The magneto breaker point clearance should be .018. This clearancd can be obtained by:

- 1. Loosening breaker point plate holding screw.
- 2. Turn breaker point eccentric screw.
- Tighten the holding screw. (See Photo No. 4).

Timing Magneto

If magneto is not properly timed:

- 1. Remove valve cage cover and spark plug.
- Turn engine over in direction of rotation until the intake valve opens and closes.
- Continue to turn engine until mark on flywheel lines up with top dead center mark on blower housing.
- If blower housing is removed, check top dead center through spark plug hole using a wire.
- Hold detached magneto flat on bench and turn the magneto gear clockwise with the left hand until the magneto impulse coupling makes a snapping noise.
- 6. Stop turning when this noise is heard.
- 7. Assemble magneto to engine.
- Turn engine over slowly until impulse coupling snaps again.
- The mark on the flywheel should then be in line with the top dead center mark on the blower housing. If not, it may be necessary to rotate magneto gear counterclockwise to retard or clockwise to ac'vance.

To Check Magneto Timing with Engine Running Use a timing light. With engine running, themark on the flywheel should line up with the ignition mark on the blower housing. A tolerance of 5' advanve and 3' retard is permissible.

Spark Plug

This is a standard 14 mm. automotive type plug, with a recommended Champion J-8 Motor Scooter. Use A5 in Industrial and Power Package Unit. The spark gap should be set at .030 and should be checked with a spark plug wire feeler gauge. Spark plug should be seated snugly. If tightened too tight, point clearance may be distorted.

MAINTENANCE

Removing the Engine from The Imperial Scooter:

- 1. Drain engine oil by the
- Drain engine oil by removing oil drain plug located on the left side of engine base.
- 2. Unlock compartment hood at rear.
- 3. Raise hood.
- Slide seat cushion toward rear of machine and lift out.
- Remove the lower trim clamp located below the foot starter pedal.
- Disconnect tail lamp wire at junction located at the outer side of the flywheel blower housing.
- 7. Close gasoline shut-off valve at the filter.
- 8. Remove gasoline line clamp from body.
- 9. Disconnect gasoline line from filter.
- Remove the four body bolts which are located ono both sides of the body at the base.
- 11. Remove the body by holding the tail lamp bracket in one hand and placing the other hand under the seat back, and lift up both ends with a rolling movement, rolling the front of the body to the rear.
- 12. Remove muffler and tail pipe.
- 13. Remove the drive belt by fully expanding the drive pulley and forcing the belt to the center of the hub. (See Photo No. 5).
- 14. Roll belt over outer edge of driven pulley, revolving pulleys until belt is free.
- Disconnect carbureter throttle and choke wires from the carbureter and bracket.
- Remove throttle wire housing clamp from blower housing
- Disconnect ground wire at magneto and flywheel generator wire from blower housing back plate.
- Remove the two front engine rubber mount bolts.
- Remove rear rubber mount bolt nut, which is attached to the countershaft bracket.
- 20. Lift engine out.

To install engine, reverse the foregoing procedure.

Drive Pulley and Clutch Shoe Assembly:

- Remove Tinnerman pal nut, ½" jam nut and washer from end of crankshaft.
- 2. Pull the drive pulley assembly off the



Drive Pulley and Clutch Shoe Assembly (Cont'd)

crankshaft.

- When pulling the clutch shoe assembly from the crankshaft, remove the snap ring with Tru-Arc pliers.
- Use a puller that will not spring the clutch shoe assembly plates.

To install this assembly on the crankshaft:

- Place the Woodruff key in the keyway of the shaft.
- Slide the clutch shoe assembly part way way on the shaft.
- Line up the two dogs protruding from the clutch hub with the two notches in the starter gear.
- Drive the clutch shoe assembly on with a sleeve driver past the groove provided for the snap fine.
- 5. Install snap ring.
- 6. Pull clutch hub back against snap ring.
- Clean the needle bearings and ball bearings in the drive pulley assembly.
- Pack bearings and hub with Mobil No. 5 lubricant or the equivalent.
- Slide the drive pulley assembly onto the shaft.
- Place washer and nut on the end of the shaft and lock in place with Tinnerman pal nut.

Countershaft - Power Package Unit

Assembly of the countershaft in mounting bracket is accomplished as follows:

- Pack bracket housing with approximately ½ cup of lubricant (Mobil No. 5 or equivalent).
- Place ball bearing on power take-off side of shaft to a point approximately one inch past ring groove. Be sure grease shield is on outside of bearing.
- 3. Press sprocket on shaft just past ring groove.
- 4. Install collar and lock ring.
- Press bearing and sprocket back against collar and lock ring.
- Place spacer sleeve on shaft and install shaft in shaft housing.
- Place second ball bearing on end of shaft with seal on outside, flush with end of housing. (Note: both bearings are identical).
- 8. Rotate shaft. Be sure it is running free and smooth.
 - Mount driven pulley on shaft and lock in place.

Foot Starter

To remove or assemble foot starter assembly on engine, it is necessary to remove the belt, the drive pulley and clutch shoe assembly. Pedal assembly is positioned around the crankshaft, The starter pedal hub and hub bearing are slipped over the '2" bolt protruding from the crankcase. The bracket is mounted back of the starter pedal on three 5/16" bolts protruding from the main bearing housing. A one inch spacer is used on the longest of the three bolts to line bracket up properly. Starter return spring is mounted between starter pedal assembly and bracket. Starter pinion on the crankshaft is installed with the notched end facing out. Should starter gear segment require replacement, the pins may be driven out with a punch and a new segment installed. One end of pins should be arc welded to starter pedal assembly.

Flywheel and Generator

- 1. Remove blower housing.
- The flywheel can then be removed by unscrewing the 7/8" hex nut from the end of the crankshaft.
- The flywheel should be removed with a puller and not broken loose from taper seat by tapping around perimeter as this may demagnetize generator magnets.
- Extreme care should be taken not to damage generator armature located inside the flywheel.

Generator Armature Mounting

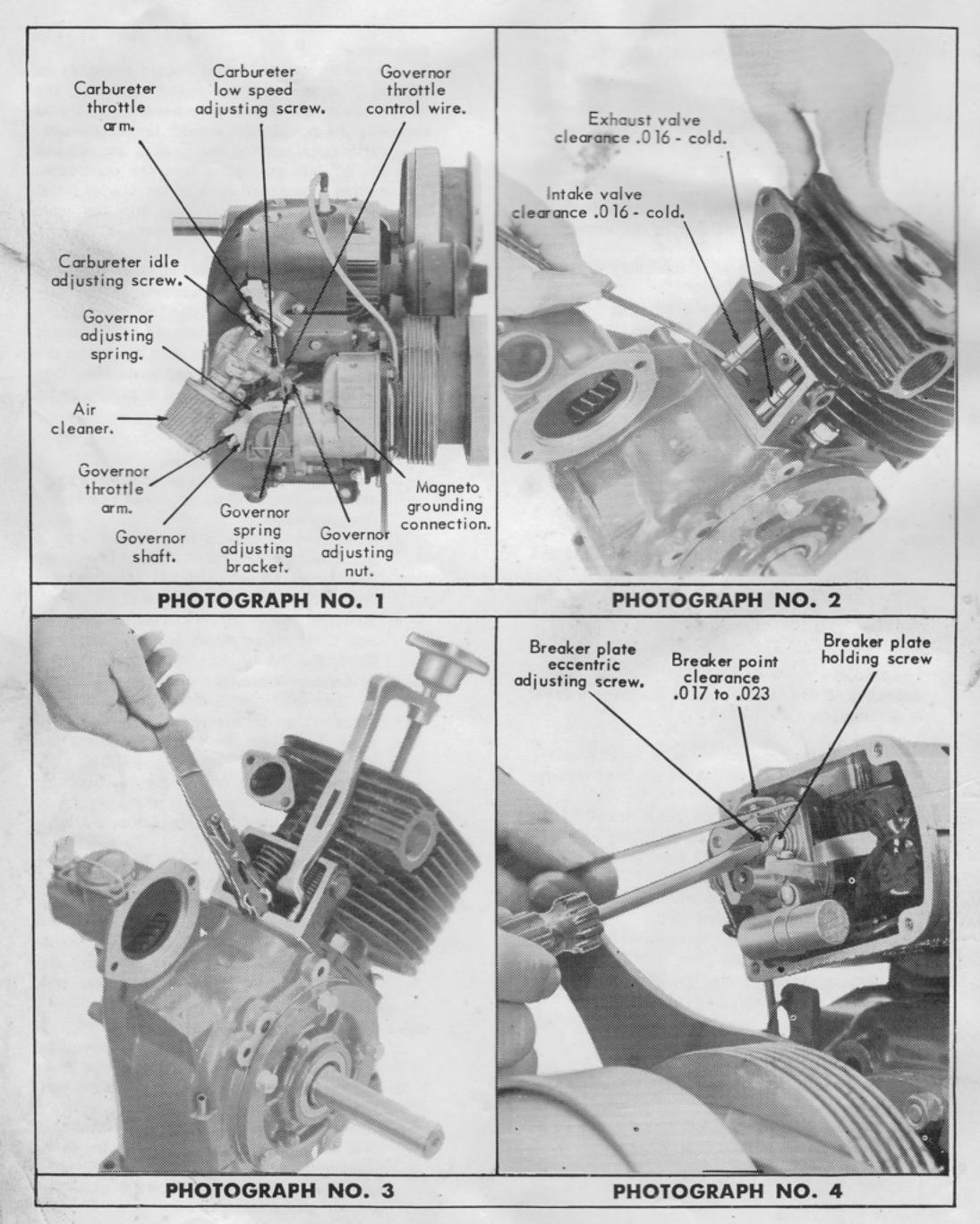
- Be sure that the fiber insulating washers are used on both sides of the field coil when installing the round head machine screws.
- These screws should be tightened snugly with a light screw driver. Care should be exercised to keep field coil wires fron contacting engine housing.
- 3. At such time as it may be necessary to replace the flywheel generator armature assembly, a dial indicator should be fastened to the crankshaft and rotated to determine concentricity of armature after mounting. Clearance between armature and flywheel generator magnet should be held between .007 and .010.

Blower Housing Back Plate:

- 1. Attach the ground wire of the field coil to the stud directly under the oil filler cap.
- Set the plate on the projecting studs and install the oil filler cap.
- Attach the positive lead from the generator field coil to the screw provided in the back plate, being sure that fiber insulating washers are used on both sides of the plate to prevent grounding.

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Cylinder Head:

- Before replacing the head, remove all carbon.
- The head gasket should be carefully cleaned and examined for "blow-by".
- Place the gasket and head on the cylinder and install the eight cap screws as to their respective lengths. Use no shellac or other sealing compounds on this gasket.
- A torque wrench should be used, setting these cap screws to 240 inch - pounds - cold.
- Retighten to 240 inch-pounds after engine has been run and warmed up.

Engine Valves:

- L To remove the valves, take off the valve
- Use a valve lifter to depress the springs, then remove the valve seat locks.
- The valve stem guides and exhaust valves seat are replaceable.

Refacing valve and valve seats:

- Determine whether or not valves, exhaust valve seat and valve guides are fit for additional service, by cleaning and refacing.
- Whether old or new valves are used, they should be refaced for proper seating.
- Valve seats should be refaced by honing.
 The intake valve clearance should be .016
 cold.
- The exhaust valve clearance should be .016 - cold.
- To obtain the proper valve clearance, grind off ends of valve stems.

Crankshaft:

After connecting rod has been removed (See Photo No. 7), remove nuts from the main bearing housing plate on power take-off side, and gently drive the crankshaft through from the flywheel side, taking care not to damage the ball bearing on the on the power take-off side. (See Photo No. 8).

Installation of Governor

- Install weight carrier assembly to the magneto gear.
- Install governor shaft and arm assembly through the magneto mounting opening and through the drilled hole provided for the governor shaft bushing, which is placed over the shaft and screwed into the case.
- Install governor hub and armassembly on governor shaft assembly, which extends through the bushing.
- 4. Place governor adjusting spring bracket on magneto bolt nearest carbureter.

- 5. Attach the governor adjusting screw and knurled nut to governor adjusting bracket.
- Connect governor adjusting screw to the spring and arm assembly.
- 7. Insert throttle wire through the carbureter throttle arm and attach to the governor throttle arm.
- Place the governor throttle arm assembly on top of the torsion spring picking up one end of the torsion spring with the governor throttle arm assembly.
- Place flat washer on top of the governor throttle arm assembly and insert cotter key through hole in governor shaft assembly.
- To increase R.P.M., turn knurled governor adjusting nut clockwise, increasing spring tension. To decrease R.P.M., loosen nut.

Disassembly of the Crankshaft Components

The crankshaft assembly should not be disassembled unless to replace the main ball bearing. This is accomplished as follows:

- Remove three cap screws which hold the retaining plate onto the main bearing housing.
- Support the main bearing housing in your left hand with the crankshaft in an upright position and then gently tap the crankshaft with a soft mallet.
- Remove the snapring holding the ball bearing in place.
- 4. The bearing can then be pressed off the shaft.

Main Bearings

Replaceable main bearings are sleeve and ball type. The ball bearing is located in the power take-off side and the sleeve type in the flywheel side of the engine. Babbit lining in sleeve bearing must be reamed after installation.

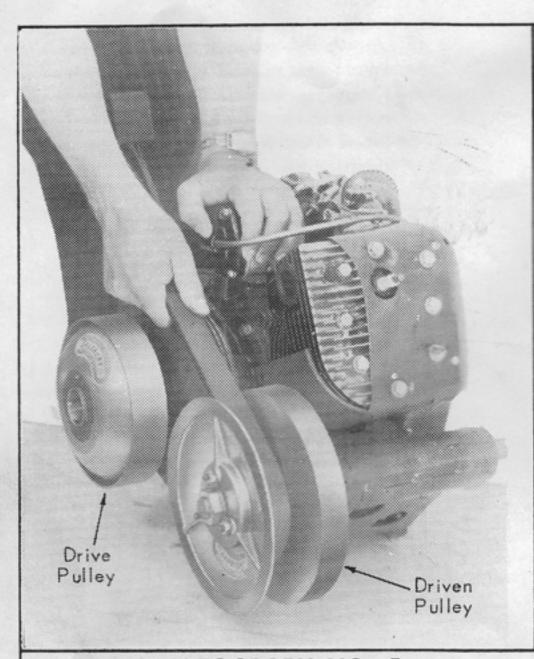
Camshaft and Gear:

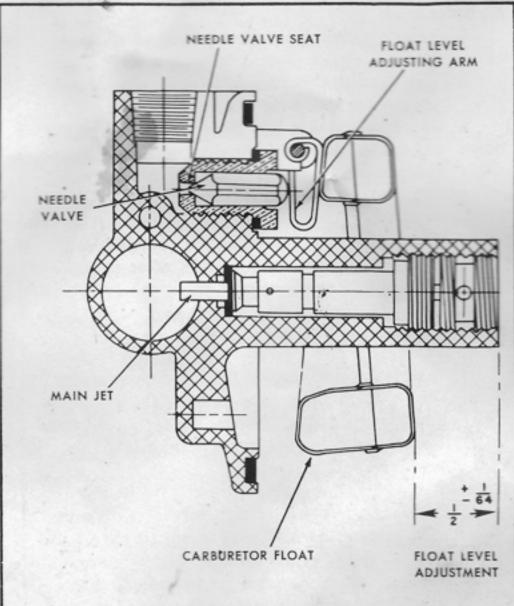
- Remove the camshaft spindle hole cap which is located on the flywheel side by prying off with a screwdriver.
- 2. Drive the camshaft spindle out from the flywheel side with a soft punch.
- 3. The camshaft and valve tappets can then be removed.

Installation of Camshaft Gear and Valve Tappets

 Install the valve tappets. These are interchangeable.

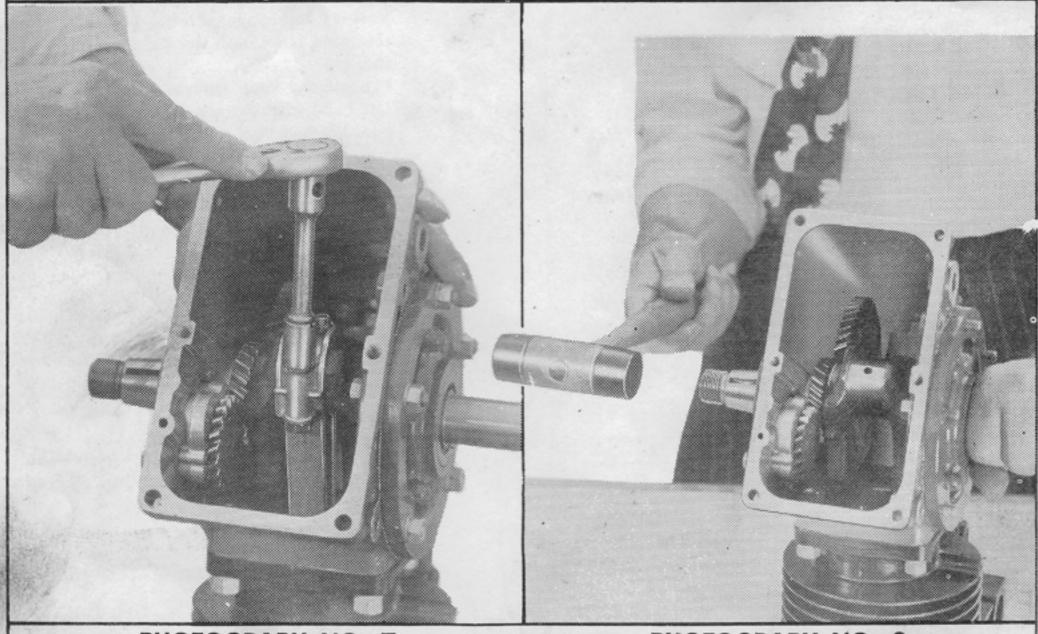






PHOTOGRAPH NO. 5

ILLUSTRATION NO. 6



PHOTOGRAPH NO. 7

PHOTOGRAPH NO. 8

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Camshaft and Gear (Cont'd)

- When installing the camshaft in the crankcase, insert tapered end of the camshaft spindle into the hole located on the main bearing retaining plate side then drive in place.
- Install camshaft spindle plug so that the outer edge of the plug is flush with the milled surface of the crankcase.
- Cover the other end of the spindle shaft with the cap, using gasket sealing compound, to prevent oil leaks.
- When installing new camshaft, end play should be .002 to .006.
- Clearance between cam gear and crankshaft counter balance not less than .005.

Engine Cylinder

Install the gasket and place lock washers under cylinder hold down nuts. Care should be taken to see that the four nuts are tight enough to prevent oil leakage around the gasket.

Crankcase Breather

The Crankcase Breather is a check valve type located in the upper part of the crankcase between the valve tappets. It can be replaced only when cylinder is removed from the crankcase.

Oil Pump

The oil pump is a positive displacement gear type which operates at a pressure of 45 to 50 pounds. A repair kit is available for servicing this unit.

Engine Base

Two types of bases are used, one with hanging brackets for the Motor Scooter and the other with flat mounting brackets used on the Industrial Engine, Power Package Unit and Turret Power Unit. Remove the engine base by removing the four corner base bolts and the two cap screws located in the middle of the base. Care should be taken not to damage the gasket.

Before installing the base, be sure that the base and oil strainer have been cleaned thoroughly in gasoline. One gasket is used between engine crankcase and base. Care should be exercised to see that the gasket does not cover the drilled hole leading from the oil pump. It is recommended that a new gasket always be used.

CAUTION: Do not use shellac or other sealing compound in replacing gasket as the removal of this substance, if not done properly, may cause damage to the milled surfaces of the parts.

The four corner bolts with their flat washers on the heads and lock washers under the nuts can be assembled and tightened. Base bolts should be alternately tightened. If engine has two gaskets and a baffle plate between crankcase and base, do not assemble with baffle plate, use one gasket only.

Connecting Rod and Piston

After base and cylinder head have been removed, turn the crankshaft until the two connecting rod bolt nuts are accessible. Straighten the two connecting rod bolt lock plates and remove the nuts, bolts and washers. (See Photo No. 7). The connecting rod cap is then lifted off and the piston withdrawn upward through the cylinder.

Piston and Rings

New piston rings should be checked for end gap clearance before they are installed on the piston. This is accomplished by inserting the rings, one at a time, in the cylinder (See Photo No. 9) and bringing it into a level position by using the piston as a plunger. (See Photo No. 10). When the ring has been placed in a level position in the cylinder, check the gap between the ends of the ring with a feeler gauge. (See Photo No. 11). This clearance should be from .007 to .012 (See Photo No. 12 on filing ring ends). To check piston clearance, use a long feeler gause inserted between cylinder wall and piston just below the two valves with the piston inserted in operating position and rings removed. Clearance between the cylinder wall and the piston should be from .0065 to .0075. Always remove carbon from ring grooves when installing new rings. Cylinder wall glaze should be removed before installing new rings. When installing the piston, use a ring compressor to protect piston rings.

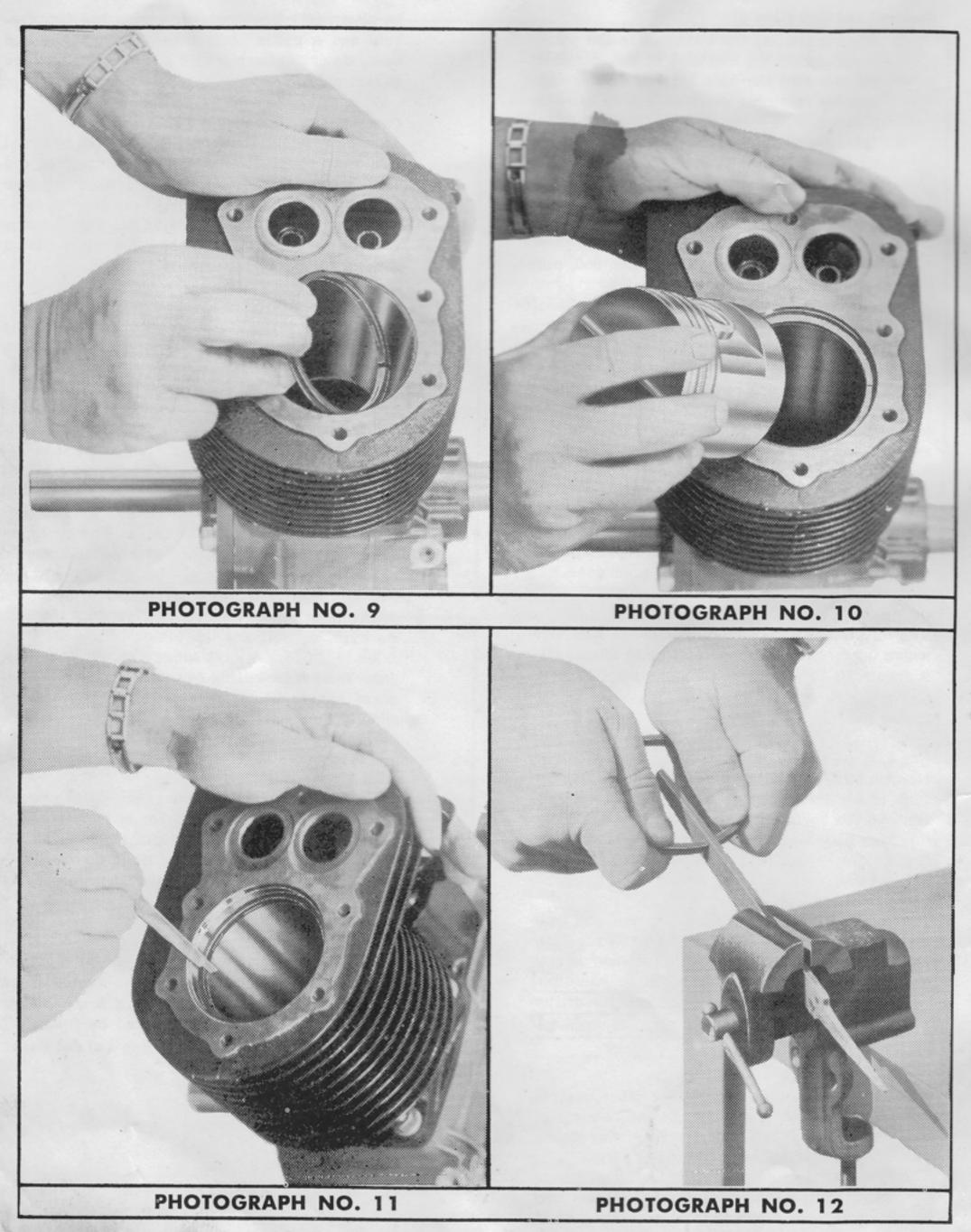
Piston Pins

If an oversize piston pin is required, it may be installed by reaming the upper end of the connecting rod and the piston pin boss. The fit should be a light hand press fit in the connecting rod, and a heavy hand press fit in the piston bosses.

Connecting Rod

Connecting rod should be checked in a connecting rod alignment jig to determine whether it is bent or twisted. When installing a new connectrod, the bearing clearance should be from .002 to .0025. Install the rod with cap and rod marks





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Connecting Rod (Cont'd)

toward the camshaft. Never file the connecting rod cap to adjust the connecting rod to the shaft. If the connecting rod bearing is too loose, install a new rod. The connecting rod bearing side clearance should be checked before the piston and rod are installed in the engine. The side clearshould be .0012 to .004. When installing the connecting rod cap, the identifying marks on the two halves of the rod bearing should correspond. Lock plates are then placed on the connecting rod bolts, the nuts tightened and locked in place by turning up the ears on the lock plates. Nuts should be tightened equally on both sides from 115 to 125 inch-pounds. Care should be taken to examine the threads on the connecting rod bolts and nuts to make sure they are in good condition. Connecting rod bearings must be oiled before installation.



DIFFICULTY IN

STARTING MOTOR

LOSS OF

POWER

UNEVEN

RUNNING

CORRECTION CHART

Starting gear segment not engaging properly. Gasoline supply inadequate. Air vent in filler cap closed. Motor Scooter tank air vent closed. Clogged fuel line, dirt in carbureter. High speed jet clogged. Water or foreign substance in gas tank. Excessive choking. Choke butterfly valve not closing. Carbureter improperly adjusted. Carbureter linkage loose or disconnected. Carbureter loose from mounting. Faulty ignition and slow timing. Ignition lead wire to spark plug disconnected. Spark plug fouled by oil or carbon. Spark plug porcelain covered with moisture, cracked or broken.

Pitted or improperly adjusted breaker points.
Loose wiring in magneto.
Condensation in magneto.
Defective condenser or coil.
Valves sticking or leaking.
Lack of compression.

Carbureter improperly adjusted.
Carbureter connections not giving full throttle opernig. opening.
Faulty ignition and timing.
Lack of compression - valves need grinding - worn rings.
Oil level low in crankcase.

Defective spark plug.
Improperly adjusted carbureter.
Gasoline low in tank.
Carbureter loosely mounted.
Loose electrical connections.
Pitted or corroded magneto breaker points.
Weak condenses or coil.
Defective governor.



OVERHEATING

KNOCKING

MOTOR WILL NOT IDLE

EXCESSIVE FUEL CONSUMPTION

EXCESSIVE OIL CONSUMPTION Oil level in crankcase too low.
Carbureter adjusted too lean.
Restricted air flow around engine hood.
Engine overloaded.
Valves need grinding.
Piston rings seized in ring grooves.
Excessive carbon accumulation.
Cooling fins coated with dirt.

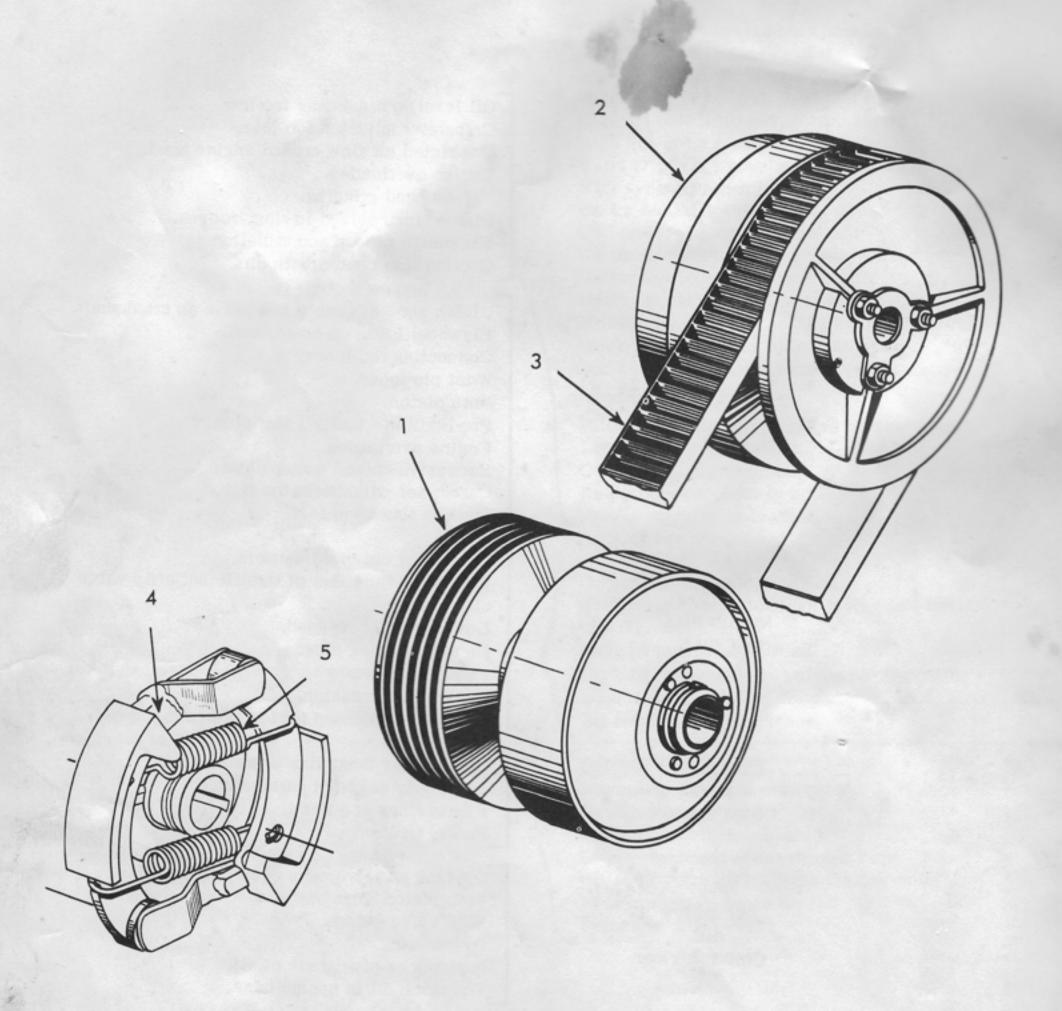
Clutch shoe assembly hub loose on crankshaft.
Flywheel loose on crankshaft.
Connecting rod loose.
Wrist pin loose.
Worn piston.
Pre-ignition - faulty spark plug.
Engine overloaded.
Excessive carbon accumulation.
Carbureter adjustment too rich.
Ignition timed too fast.

Carbureter out of adjustment.
Improper adjustment of throttle butterfly valve stop screw.
Low speed jet clogged.
Defective spark plug.
Faulty ignition.
Lack of compression.
Carbureter adjusted for too low idling speed.

Leak in gas tank, line or connections.
Improperly adjusted carbureter.
Faulty rings or valves.
Faulty ignition.

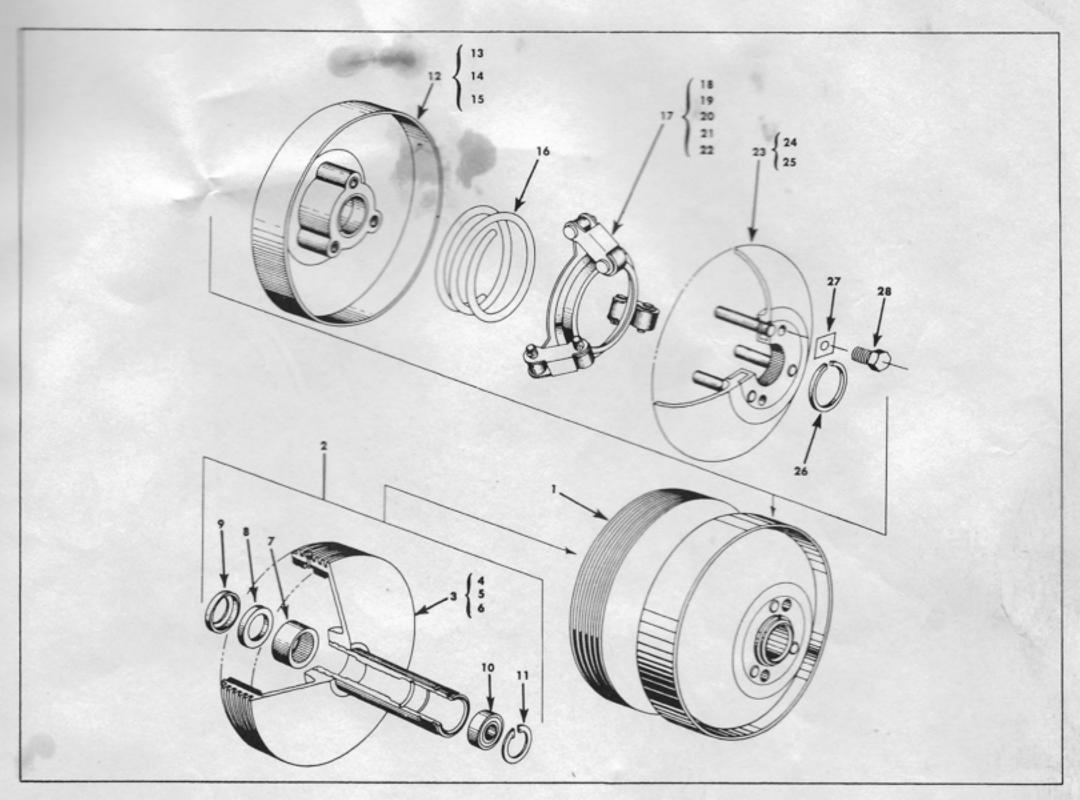
Oil leak at valve case cover, main bearing oil seals.
Worn piston rings or cylinder.
Worn valve guides.
Overheating.
Improper or poor grade of oil.
Too much oil in engine base.

AUTOMATIC TRANSMISSION



Ref. No.	Part No.	Part Name
1 2 3 4 5	5814 5859 5268 8822-1 8724	DRIVE PULLEY DRIVEN PULLEY DRIVE BELT CLUTCH SHOE ASSEMBLY SPRING CLUTCH SHOE

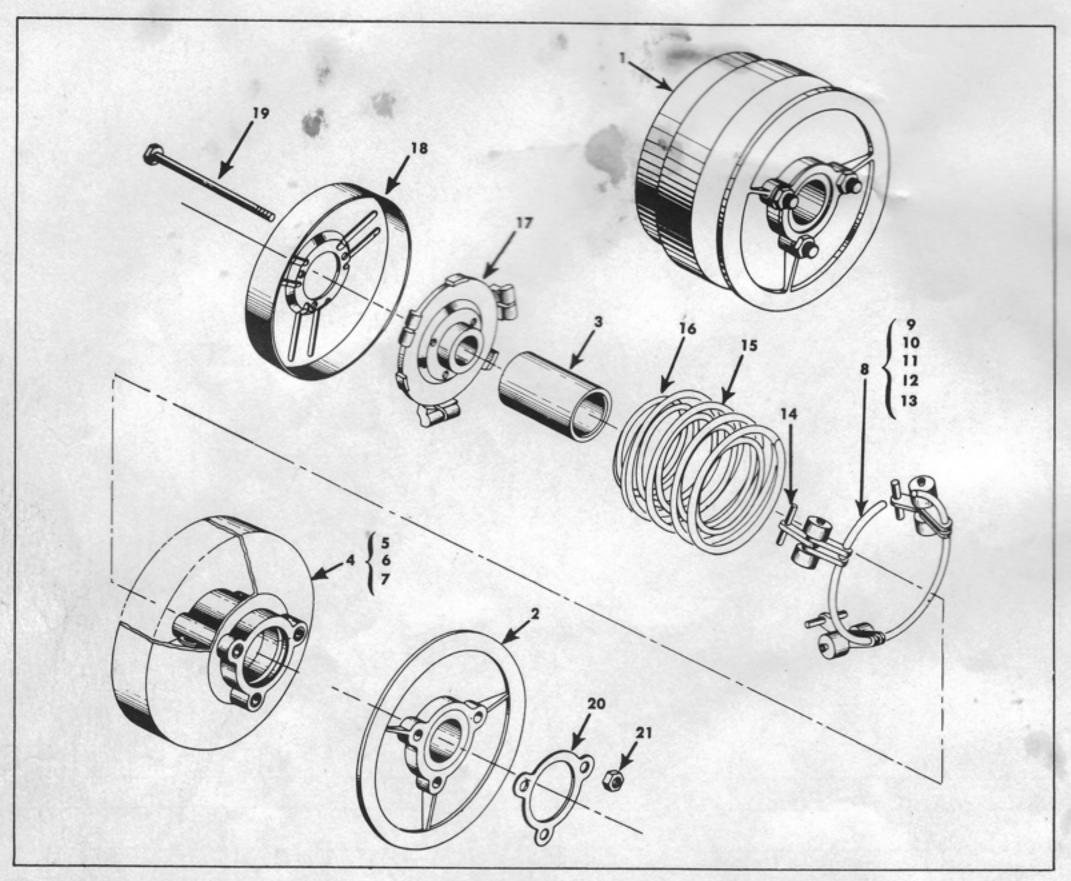
DRIVE PULLEY PARTS LIST



REF. NO.	PART NO.	REQ. NO.	PART NAME	
1	5814	1	Drive Pulley Assembly (Consists of the following Parts)	
2	6530	1	Clutch Drum Assembly (Consists of the following Parts)	
3	6531	1	Clutch Drum & Lining Assembly (Consists of the following Parts)	
4	6304	1	*Clutch Drum	
5	5801	1	Clutch Lining	
6	8019	5	Rivet	
7	5795	1	Needle Bearing (Inner)	
8	5793	1	Needle Bearing Felt Seal	
9	5794	1	Needle Bearing Felt Seal Retainer	
10	5796	1	Ball Bearing (Outer)	
11	5798	1	Ball Bearing Retaining Ring	
12	6044	1	Movable Face Assembly (Consists of the following Parts)	
13	5751	1	*Movable Face	
14	6125	3	Small Oilless Bearing	
15	6256	1	Large Oilless Bearing	
16	5258	1	Spring	
17	6528	1	Spring Cup and Weight Assembly (Consists of the following Parts)	
18	5750	1	Spring Cup	
19	5760	3	Roller Arm (Stamping)	10
20	6124	3	Roller Weight	
21	8311	6	Pin	
22	1630	12	Spring Clip	
23	6303	1	Drive Plate Assembly (Consists of the following Parts)	
24	8202	1	*Drive Plate	
25	6302	3	*Drive Pin *	
26	6394	1	Drive Plate Retaining Ring	
27	8773	2	Drive Plate Retaining Ring Lock Plate	
28	6869	2	Lock Plate Screw	

^{*}Items listed but not sold separately.

DRIVEN PULLEY PARTS LIST



REF. NO.	PART NO.	NO. REQ.	PART NAME
1	5859	1	Driven Pulley Assembly (Consists of the following parts)
2	5846	1	Fixed Face
3	5823	1	Hub
4	5969	1	Movable Face Assembly (Consists of the following parts)
5	5847	1	Movable Face (listed but not sold separately)
6	5855	6	Small Oilless Bearing
7	6256	1	Large Oilless Bearing
8	5853	1	Weight and Pivot Spring Assembly (Consists of the following parts)
9	5821	1	Pivot Spring
10	5817	9	Link
11	8310	3	Link Weight Pin
12	5816	6	Weight
13	303	6	Retaining Ring
14	5820	3	Link Pivot Pin
15	8203	1	Outer Spring
16	9051	1	Inner Spring
17	5845	1	Spring Plate
18	5822	1	Shield
19	5824	3	Long Screw
20	5825	1	Lock Plate
21	6904	3	Nut

