

PARTS MANUAL

Models

**EX27
ENGINE**

PUB-EP1679
Rev. 09/08



Industrial Power Products

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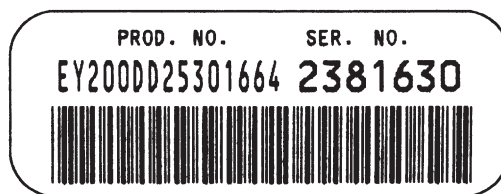
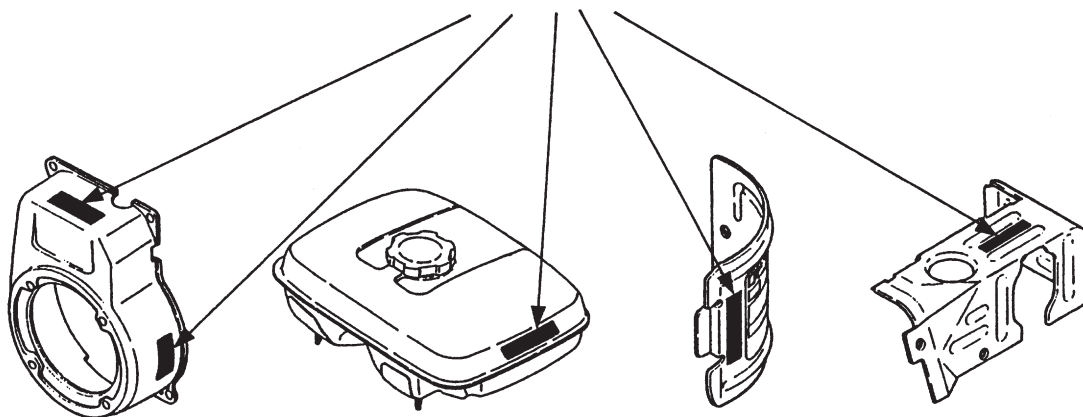
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HOW TO USE THIS MANUAL

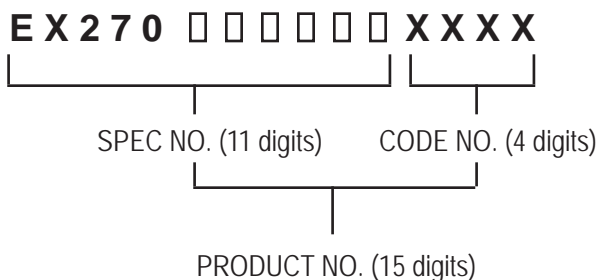
Robin engines are identified by MODEL, SPECIFICATION, and CODE NUMBER. For each model there may be many different versions called specifications. Each specification will be unique in some way. The difference may only be the paint color or it may have a different type of PTO or some other significant difference.

In order to identify the correct service part number, it is important to confirm the specification and code numbers for your engine. The specification and code number together are known as the PRODUCT NUMBER.

All Robin 4 cycle engines have a Product Number label similar to the label illustrated below.



The Product Number Label has a 15 digit alphanumeric string that consists of the SPECIFICATION (SPEC) number (11 digits) and the CODE number (4 digits). Please note the illustration below:



MANUAL LAYOUT

1— SECTION 6 FUEL GROUP

2— FIG. 600

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20,27

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DETAIL A

1—SECTION 6 FUEL GROUP

REF.	PART NO.	DESCRIPTION	QTY.	REMARKS	FROM-TO	FIG.
10	267-60103-01	FUEL TANK CP	1	YD, YS TYPE, BLACK		600
27	267-60101-01	FUEL TANK CP	1	YELLOW		600
27	073-20039-00	LABEL, WARNING	1	YD, YS TYPE		600
30	043-04300-15	FUEL TANK CAP CP	1			600
31	267-95201-03	LABEL, EMISSION	1	YD, YS TYPE		600
40	064-13600-10	FUEL FILTER	1			600
50	064-20021-01	FUEL STRAINER AY	1			600
-1	064-20002-20	FILTER	1			600
-2	064-20002-30	GASKET	1			600
-3	064-20019-10	CUP	1			600

1. SECTION NAME Parts are broadly classified according to their functions. Refer to the Group Index (table of contents) for respective section name.
2. FIG. No. The FIG. number indexes the reference and part numbers to the illustration. Figure numbers that vary only in the tens place (i.e.: 700 and 710) are in a group of the same section (i.e.:Electrical Device Group).
3. REF. No. The Reference number identifies the part illustration with the corresponding part number in the part list.
4. SUBASSEMBLY SUBASSEMBLY parts of part assembly are listed below the assembly part. The subassembly part reference number is indicated by the number led by "-" such as "-1", "-2".
5. PART NUMBER It is the number assigned for sales unit. Use the PART No. when making an order.
6. DESCRIPTION It is designation of the part.
7. QTY. Quantity of each part used for each product.
8. REMARKS This gives a distinctive feature and/or a supplementary comment for the type, the specification, and the part concerned. It also shows part number(s) interchangeable for the part.
9. FROM-TO This section shows the CODE No. to indicate the history of progress in which improved parts have been introduced in the product. The FROM-TO CODE No. helps to identify PART No. being employed in the product concerned. See the examples below:
 - The part is used in the product irrespective of CODE No.
 - 2101- The part is used in the products with CODE No. of 2101 and after this number.
 - 2100 The part is used in the products with CODE No. of 2100 and before this number.

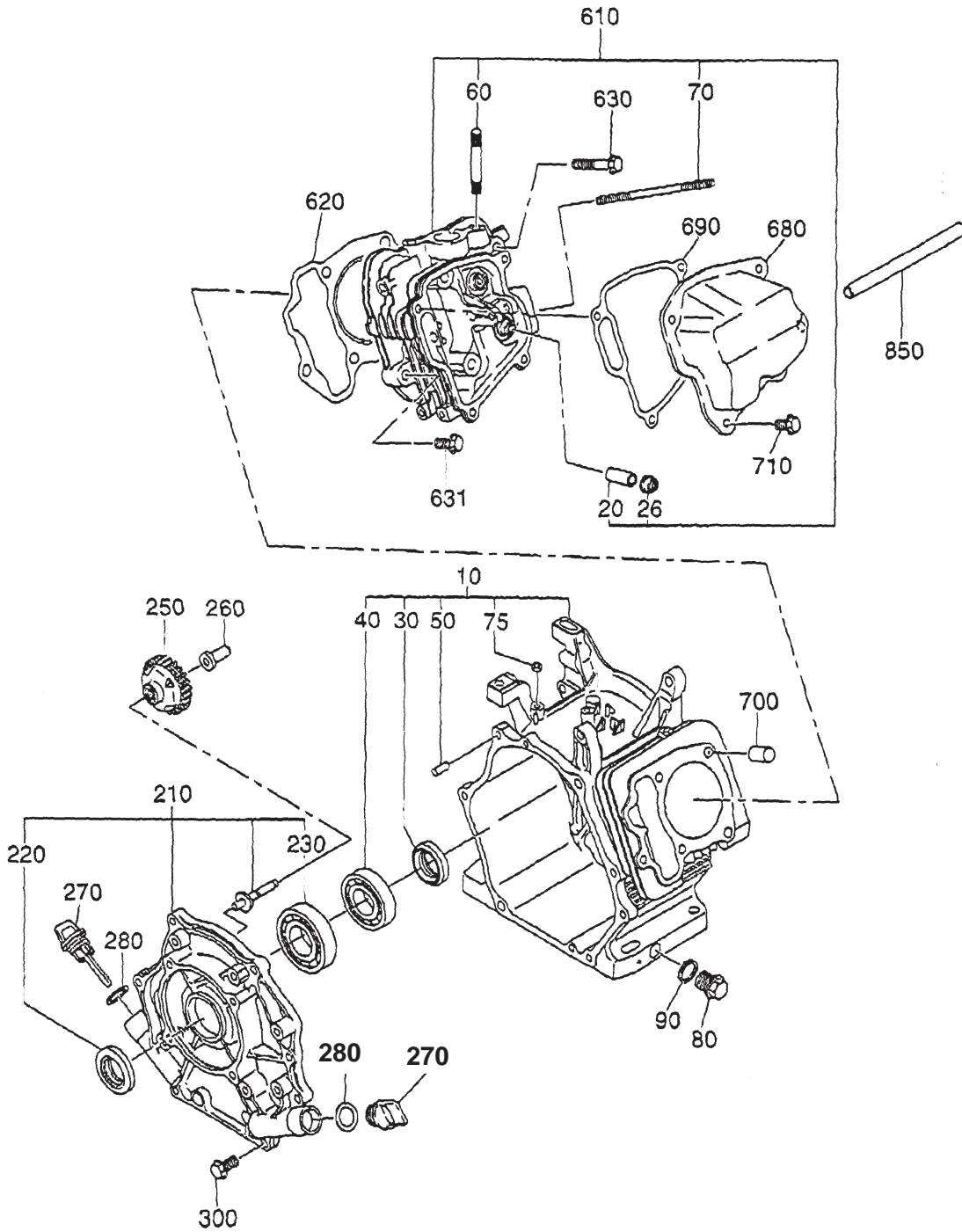
GROUP INDEX

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INDEX OF DESCRIPTION SYMBOLS			
SYMBOL	DESCRIPTION	SYMBOL	DESCRIPTION
AY	ASSEMBLY	P=	PITCH (in mm)
CP	COMPLETE	P.T.O. (PTO)	POWER TAKE OFF
EX	EXPORT (from Japan)	REF	REFERENCE
FIG	FIGURE	R.H. (RH)	RIGHT HAND SIDE
FR	FRONT	RR	REAR
"	INCH	STD.	STANDARD
INCL.	INCLUDE	SW	SWITCH
-L	LITER	T=	THICKNESS (in mm)
L=	LENGTH (in. mm)	UN	UNIT
L.H. (LH)	LEFT-HAND SIDE	U.S.	UNDER SIZE
MECH	MECHANICAL	~V	VOLTAGE
NO (NON)	NONE	~W	WATT
OPT	OPTIONAL	W/	WITH
O.S.	OVER SIZE	W/O	WITHOUT

SECTION 1 CRANKCASE GROUP

FIG. 100

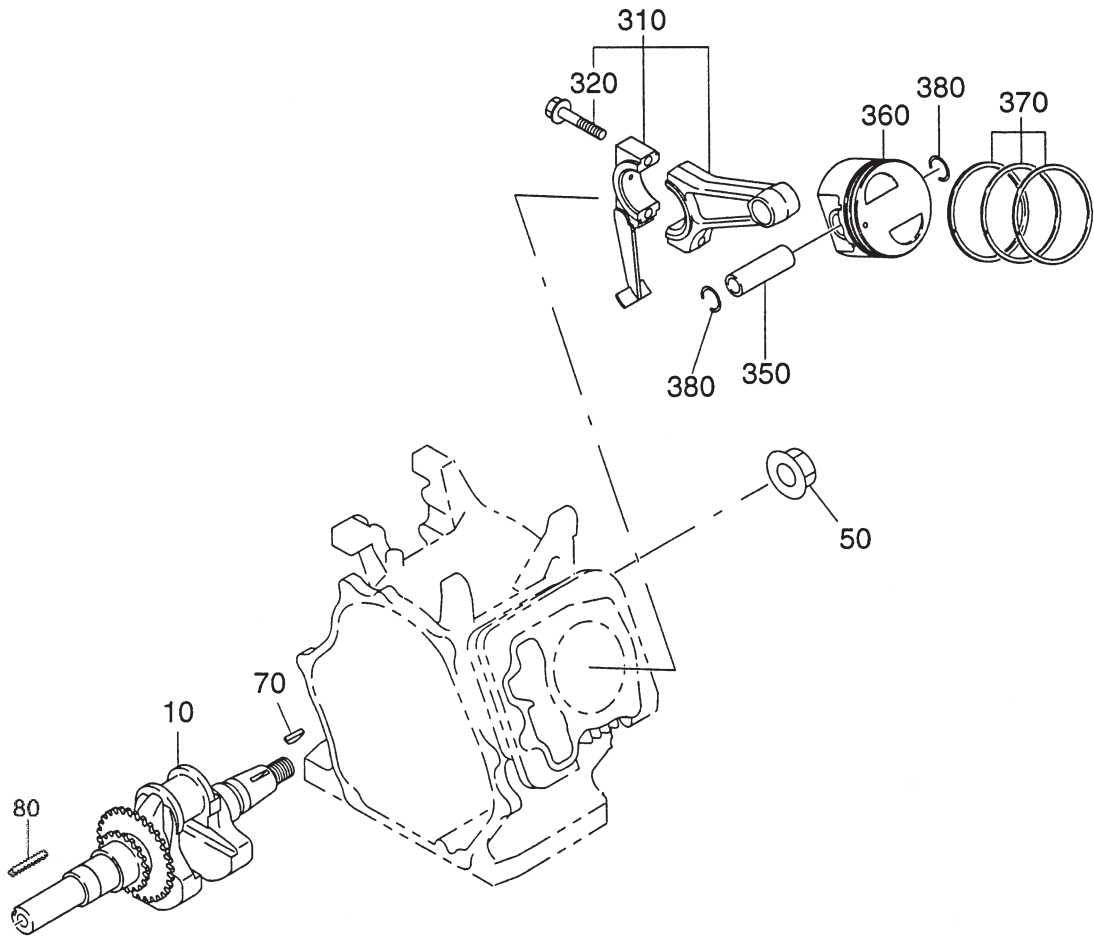


SECTION 1 CRANKCASE GROUP

REF.	PART NO.	DESCRIPTION	QTY.	REMARKS	FROM-TO	FIG.
10	279-10101-91	Crankcase Cp	1	Std	6951~	100
	279-10101-81	Crankcase Cp	1		~6950	100
10	279-10102-91	Crankcase Cp	1	w/ oil sensor	6951~	100
	279-10102-81	Crankcase Cp	1	w/ oil sensor	~6950	100
10	279-10104-51	Crankcase Cp	1	Balancer Shaft	7092~	100
	279-10104-41	Crankcase Cp	1		6951~7901	100
	279-10104-31	Crankcase Cp	1		~6950	100
20	237-14202-03	Valve Guide	2			100
26	277-16010-01	Stem Seal	1			100
30	044-03001-60	Oil Seal	1			100
40	060-03003-41	Ball Bearing	1			100
46	060-01500-11	Ball Bearing	1		7092~	100
	060-01500-10	Ball Bearing	1		~7091	100
50	277-15011-03	Pipe Knock	2			100
60	010-50802-50	Stud	2	Exhaust		100
70	010-50604-10	Stud	2	Intake		100
75	044-00600-20	Oil Seal	1			100
80	040-11400-30	Plug	1			100
90	021-11400-20	Gasket	1			100
210	279-11002-11	Main Bearing Cover Cp	1	Std		100
210	279-11004-11	Main Bearing Cover Cp	1	Balancer Shaft		100
220	044-03001-60	Oil Seal	1			100
230	060-03003-70	Ball Bearing	1			100
235	060-01500-11	Ball Bearing	1		7092~	100
	060-01500-10	Ball Bearing	1		~7091	100
250	277-45004-J1	Governor Gear Cp	1			100
260	277-41901-03	Governor Sleeve	1			100
270	279-63601-13	Oil Gauge	2			100
280	021-32000-50	Gasket	1			100
300	001-04083-50	Flange Bolt	7			100
610	279-13001-21	Cylinder Head Cp	1			100
620	279-15001-33	Gasket, head	1			100
630	011-00802-40	Flange Bolt	4			100
631	011-00803-10	Flange Bolt	1			100
680	277-15503-01	Rocker Cover Cp	1			100
690	277-16001-13	Gasket, rocker cover	1			100
700	277-15011-03	Pipe Knock	2			100
710	011-00600-20	Flange Bolt	4			100
960	279-99001-27	Gasket Set	1			100

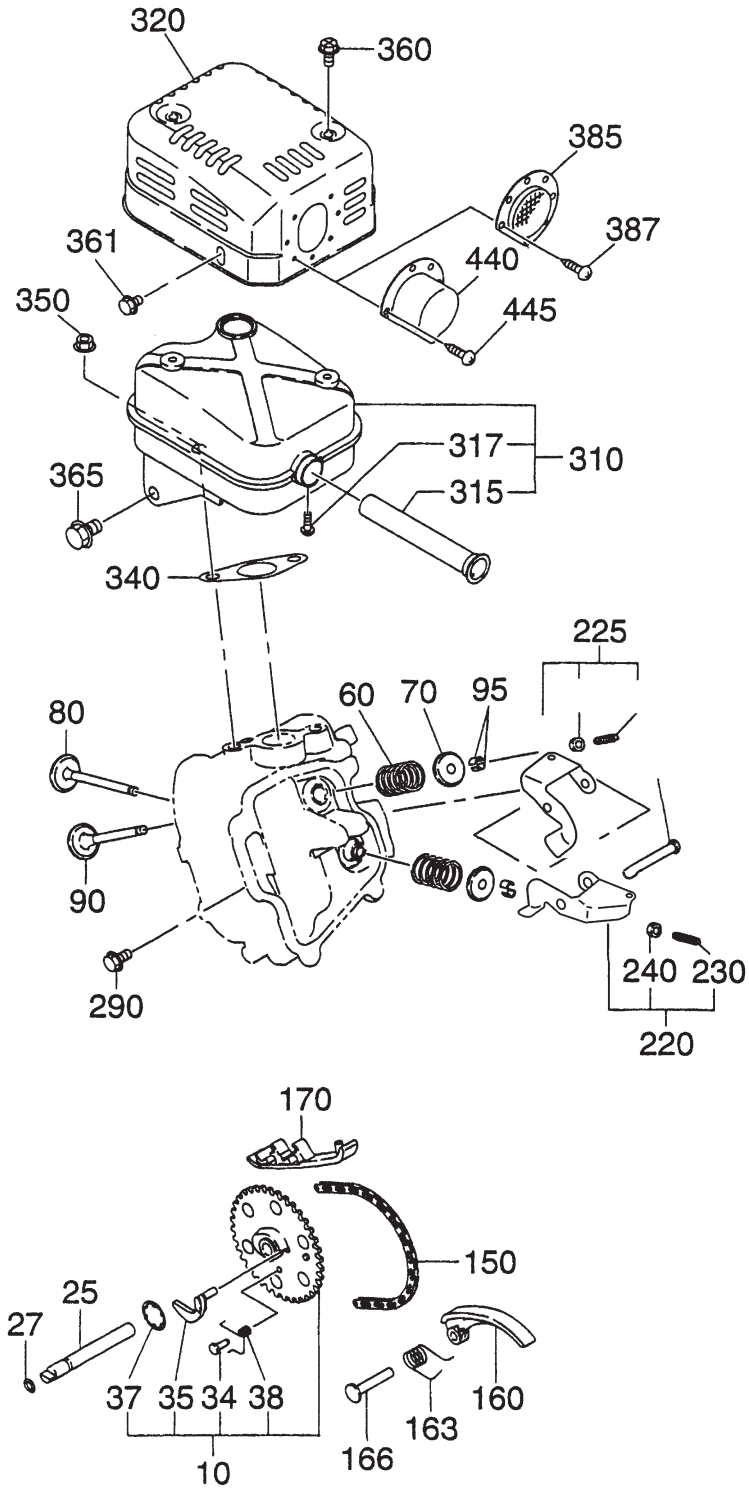
SECTION 2 CRANKSHAFT GROUP

FIG. 200



SECTION 3 INTAKE and EXHAUST GROUP - NEW STYLE

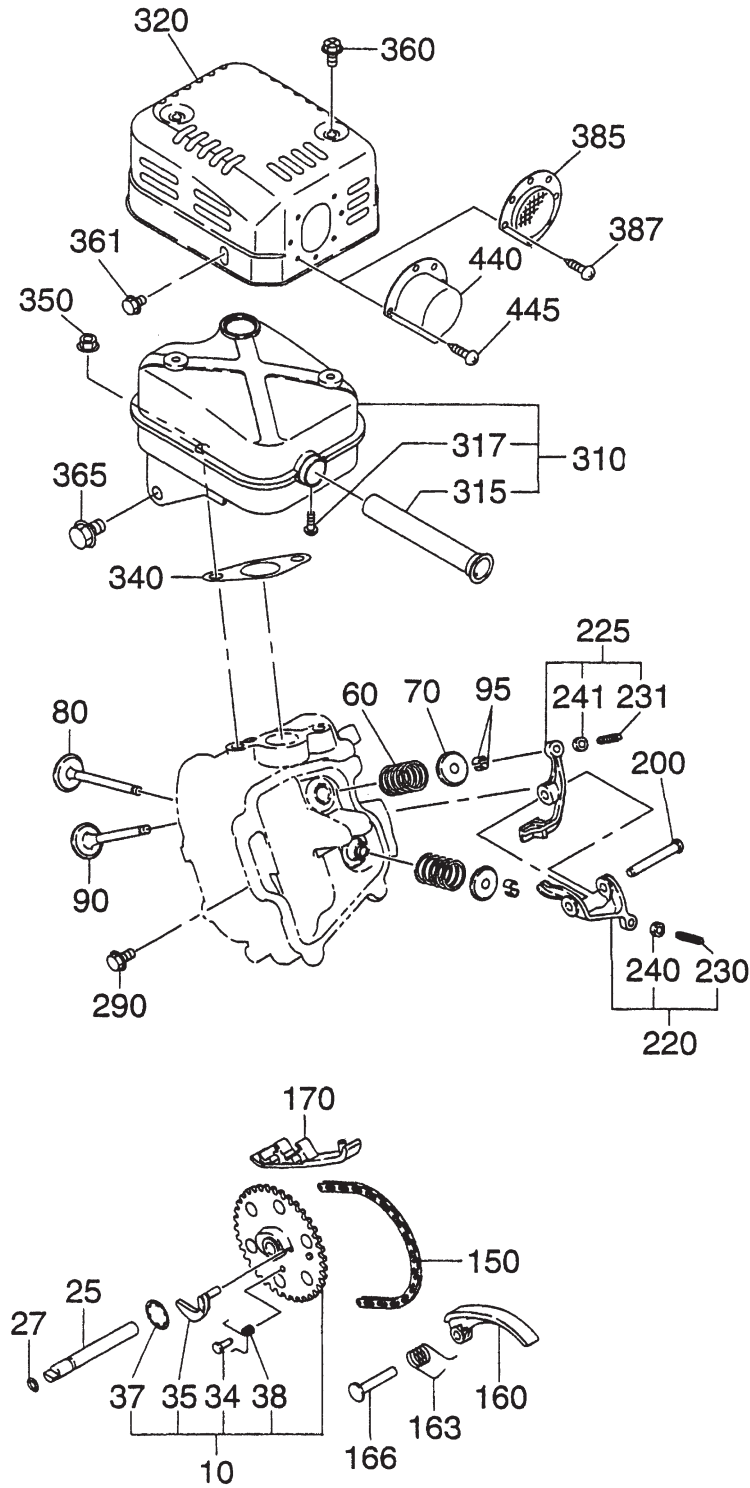
FIG. 300



SECTION 3 INTAKE and EXHAUST GROUP - NEW STYLE

REF.	PART NO.	DESCRIPTION	QTY.	REMARKS	FROM-TO	FIG.
10	279-31601-01	Camshaft Cp	1			300
25	277-35101-03	Pin, camshaft	1			300
27	024-00600-10	O ring	1			300
34	277-38601-03	Pin, spring	1			300
35	279-36401-03	Release Lever	1			300
37	277-36501-03	Clip	1			300
38	227-38701-03	Return Spring	1			300
60	279-33601-03	Valve Spring	2			300
70	269-33701-03	Spring Retainer	2			300
80	279-33401-H3	Intake Valve	1			300
90	279-33501-H3	Exhaust Valve	1			300
95	132-10KA0-31	Collet Valve	4			300
150	279-35601-11	Timing Chain	1	100 link		300
160	277-36911-03	Tentioner	1			300
163	277-37101-03	Spring, tentioner	1			300
166	277-36902-03	Pin, tentioner	1			300
170	277-36913-13	Chain Guide	1			300
200	277-35002-01	Pin, rocker cp	1			300
202	003-13050-00	Clip	1			300
220	277-36201-00	Rocker Arm Ay, intake	1			300
225	277-36202-00	Rocker Arm Ay, exhaust	1			300
230	014-90500-20	Adjust Screw	1			300
231	014-90500-20	Adjust Screw	1			300
240	017-00500-30	Nut	1			300
241	017-00500-30	Nut	1			300
290	011-00600-20	Flange Bolt	1			300
310	279-30101-L1	Muffler Cp	1		6972~	300
	279-30101-K1	Muffler Cp	1		~6971	300
310	279-30111-L1	Muffler Cp	1	DE		300
315	279-37601-01	Spark Arrestor Cp	1			300
317	015-00400-60	Tapping Screw	1			300
320	279-34201-21	Muffler Cover Cp	1		7031~	300
	279-34201-11	Muffler Cover Cp	1		~7030	300
340	277-35201-13	Gasket, muffler	1			300
350	980-20082-80	Flange Nut	2			300
360	015-20600-90	Tapping Bolt	2			300
361	011-00600-10	Flange Bolt	1			300
365	011-00803-20	Flange Bolt	1			300
385	277-37203-H1	Screen	1			300
387	015-00400-60	Tapping Screw	2			300
440	277-37001-H1	Deflector Cp	1			300
540	279-32902-J1	Insulator Cp	1			300
560	279-35902-J3	Gasket 1, insulator	1			300
570	002-38060-00	Flange Nut	2			300
580	001-04062-00	Flange Bolt	1			300

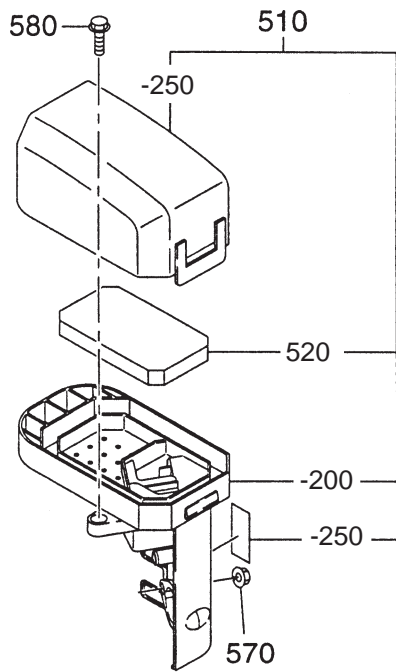
FIG. 300



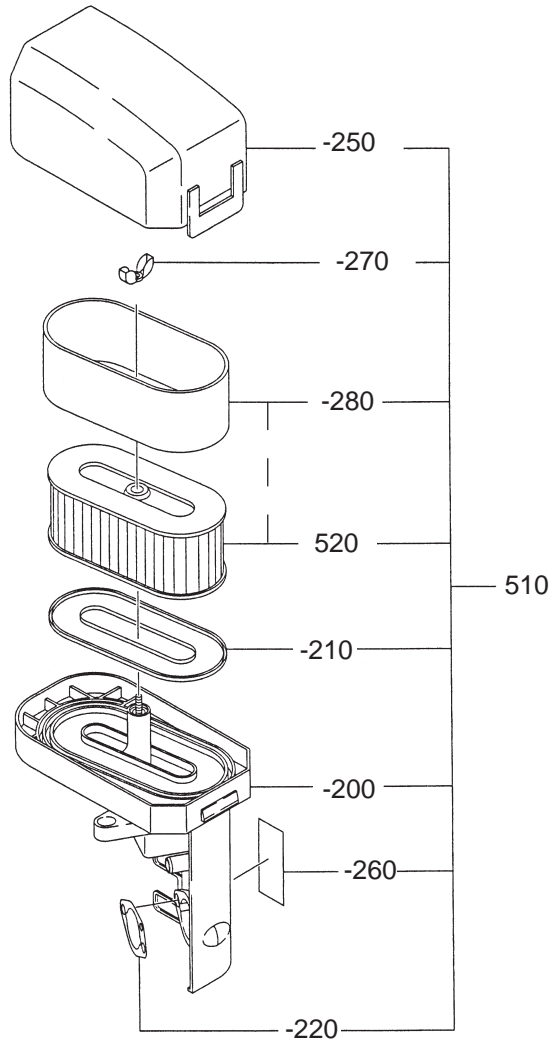
SECTION 3 INTAKE and EXHAUST GROUP

FIG. 310

A Foam



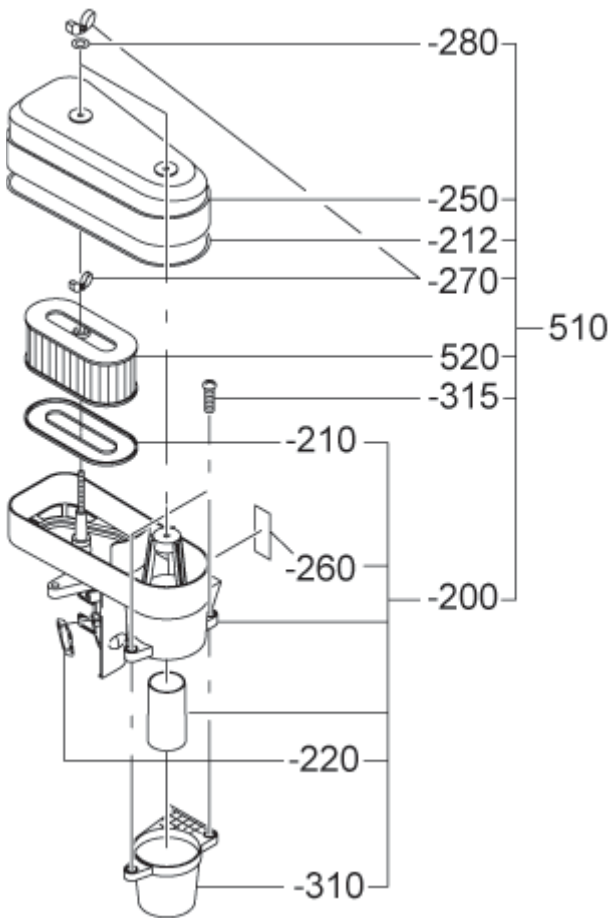
B Dual Element



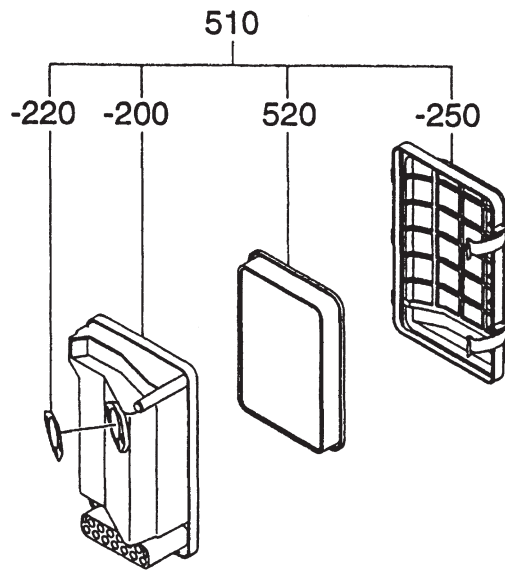
SECTION 3 INTAKE and EXHAUST GROUP

FIG. 320

C Cyclone Pre-cleaner

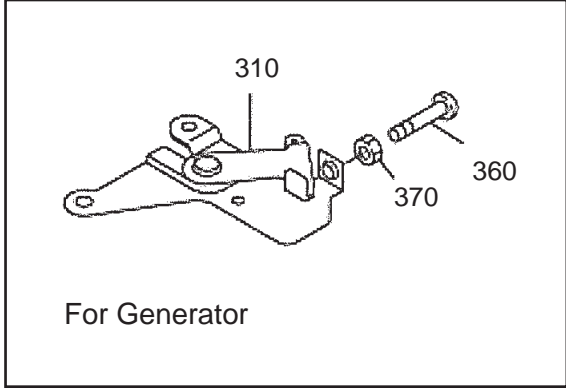
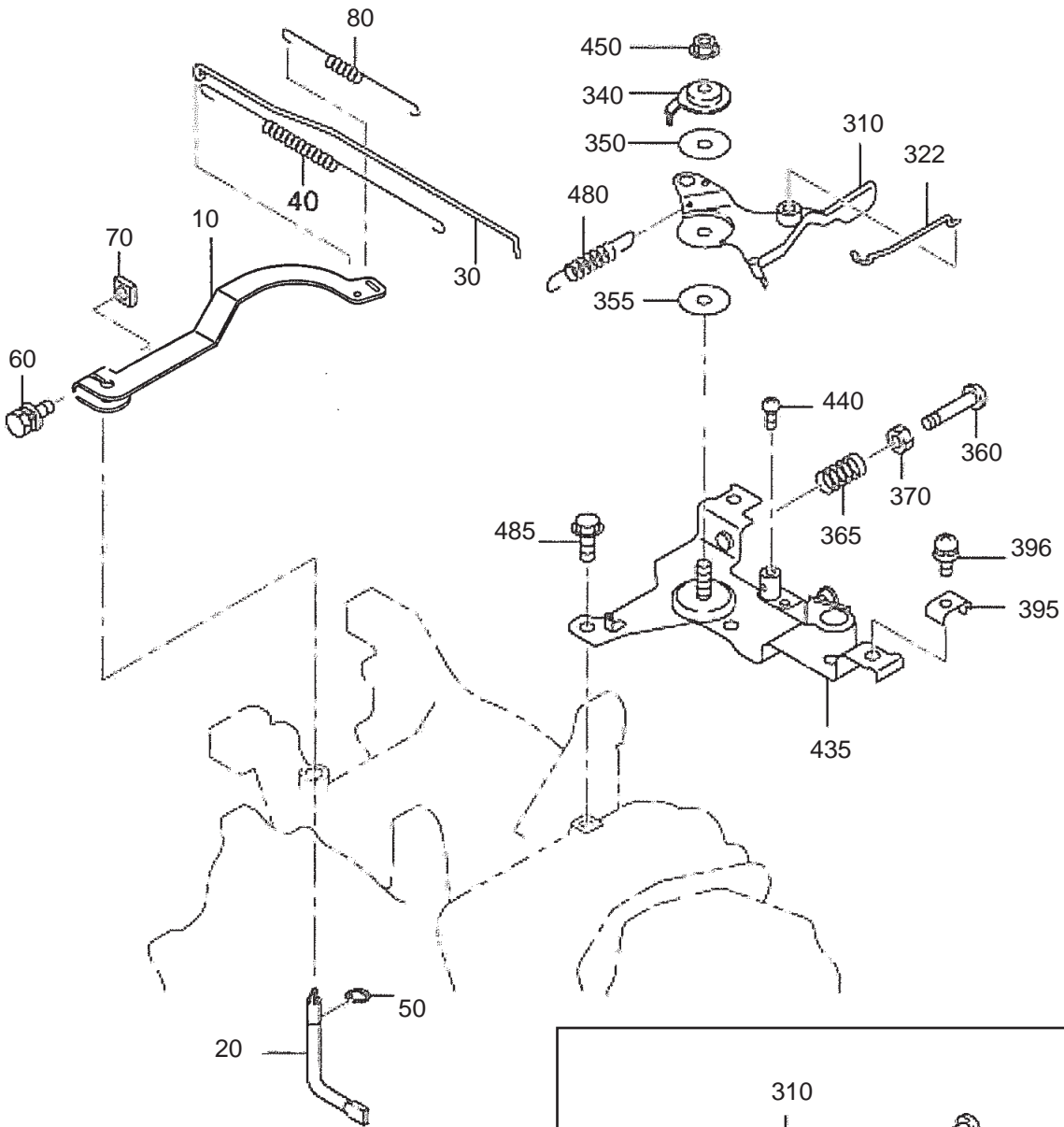


D Low Profile



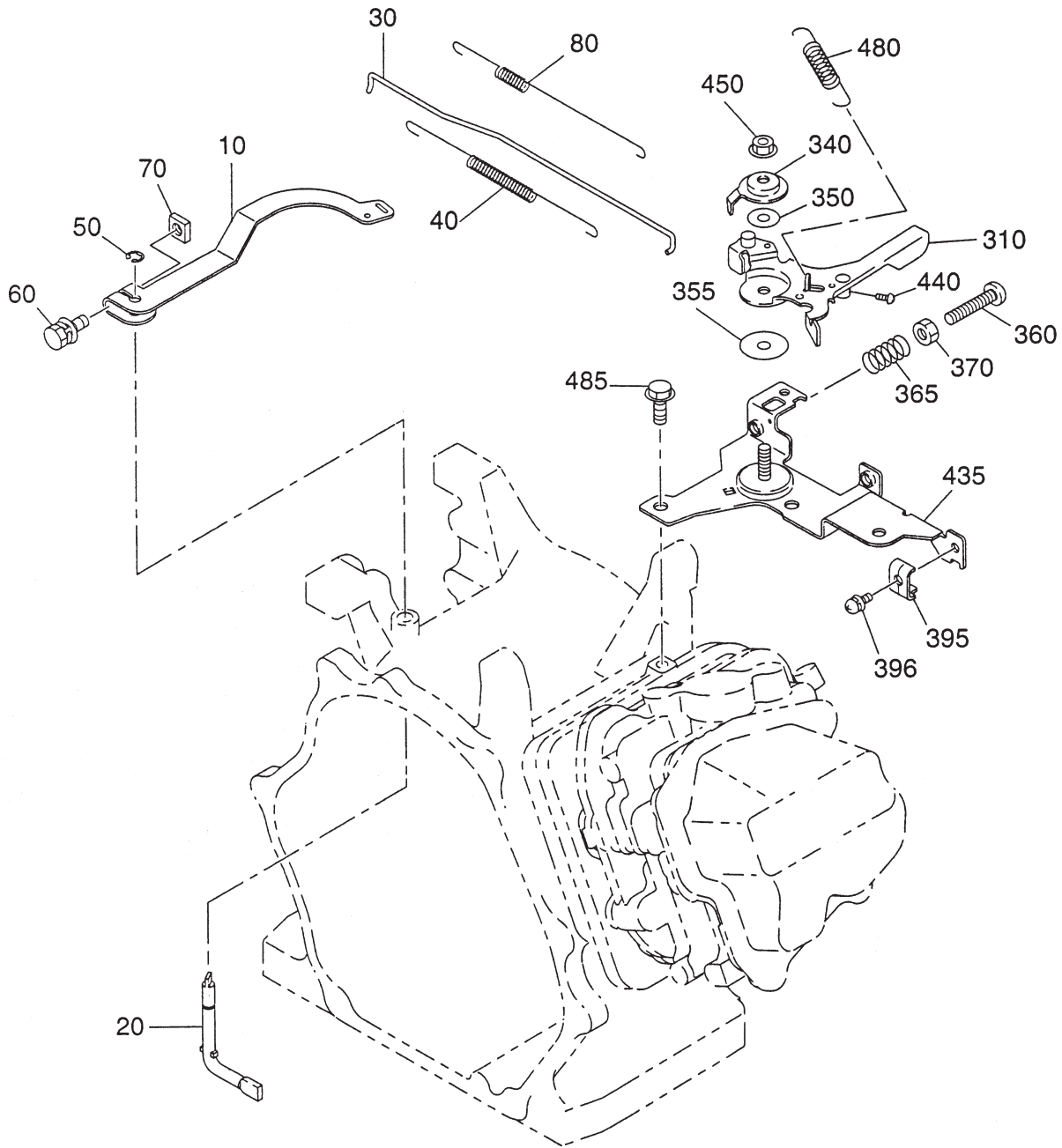
SECTION 4 GOVERNOR GROUP - NEW STYLE

FIG. 400



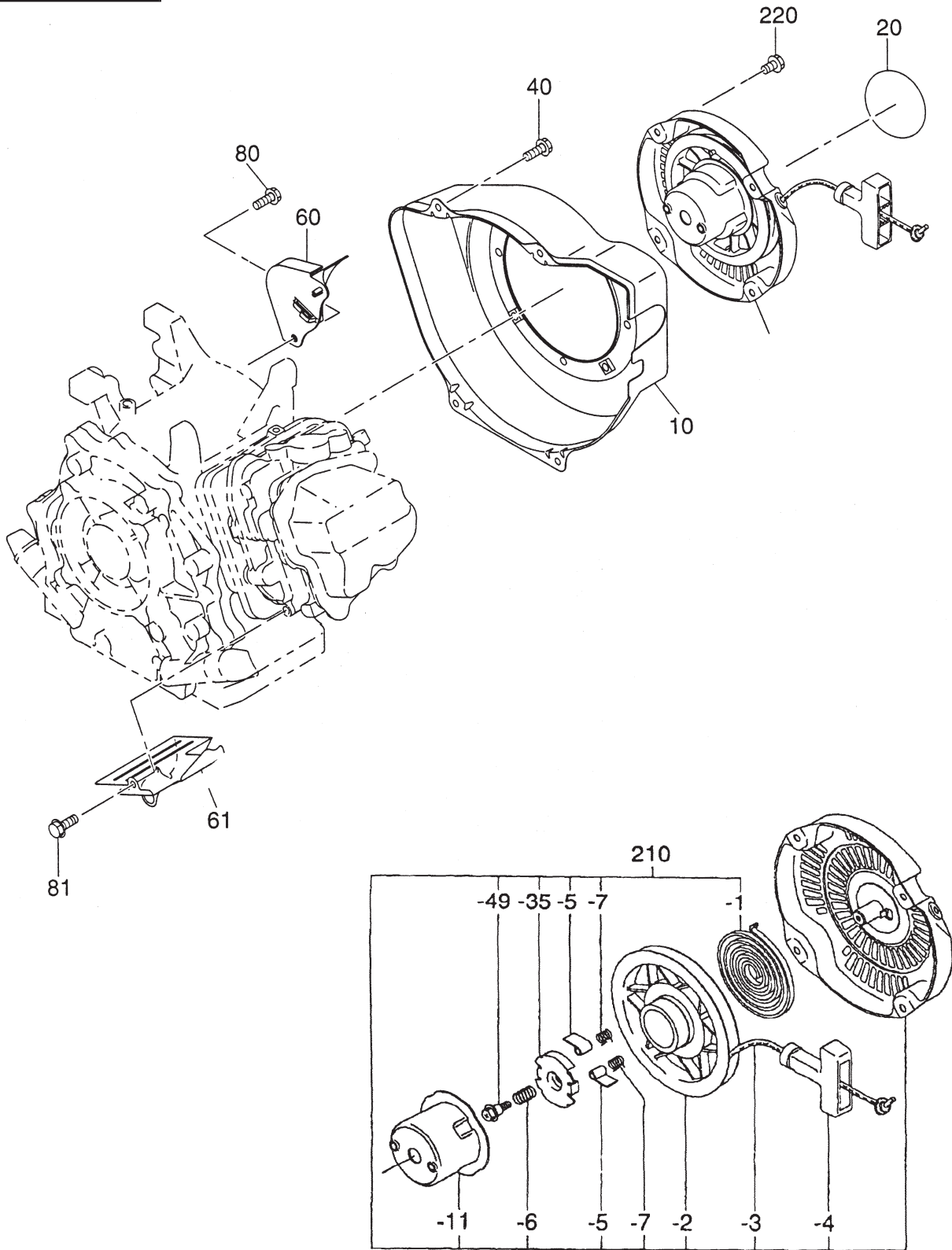
SECTION 4 GOVERNOR GROUP - OLD STYLE

FIG. 400



SECTION 5 COOLING and STARTING GROUP

FIG. 500



SECTION 6 FUEL, LUBRICATION GROUP

FIG. 600

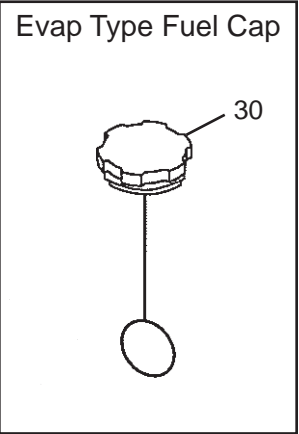
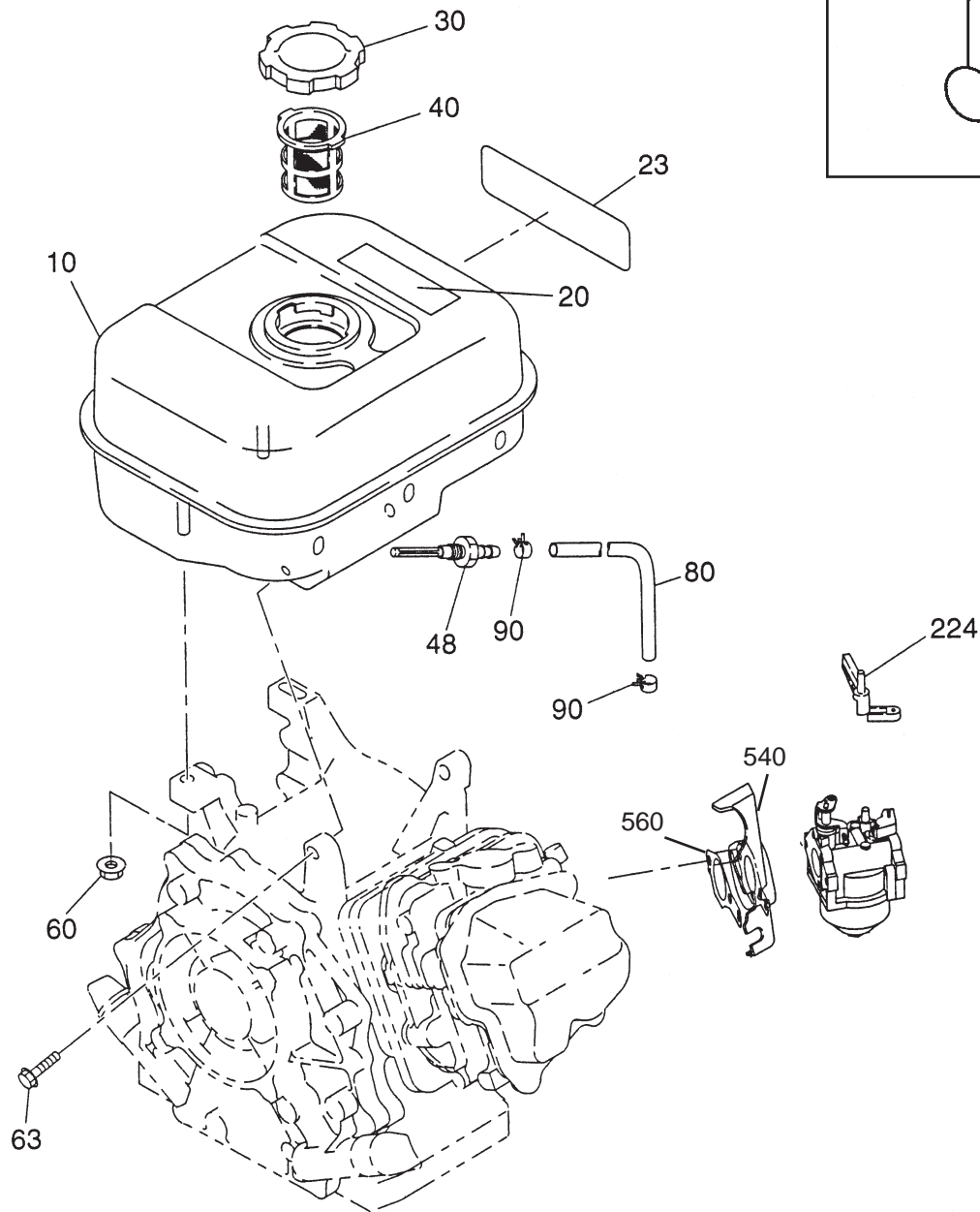


FIG. 610

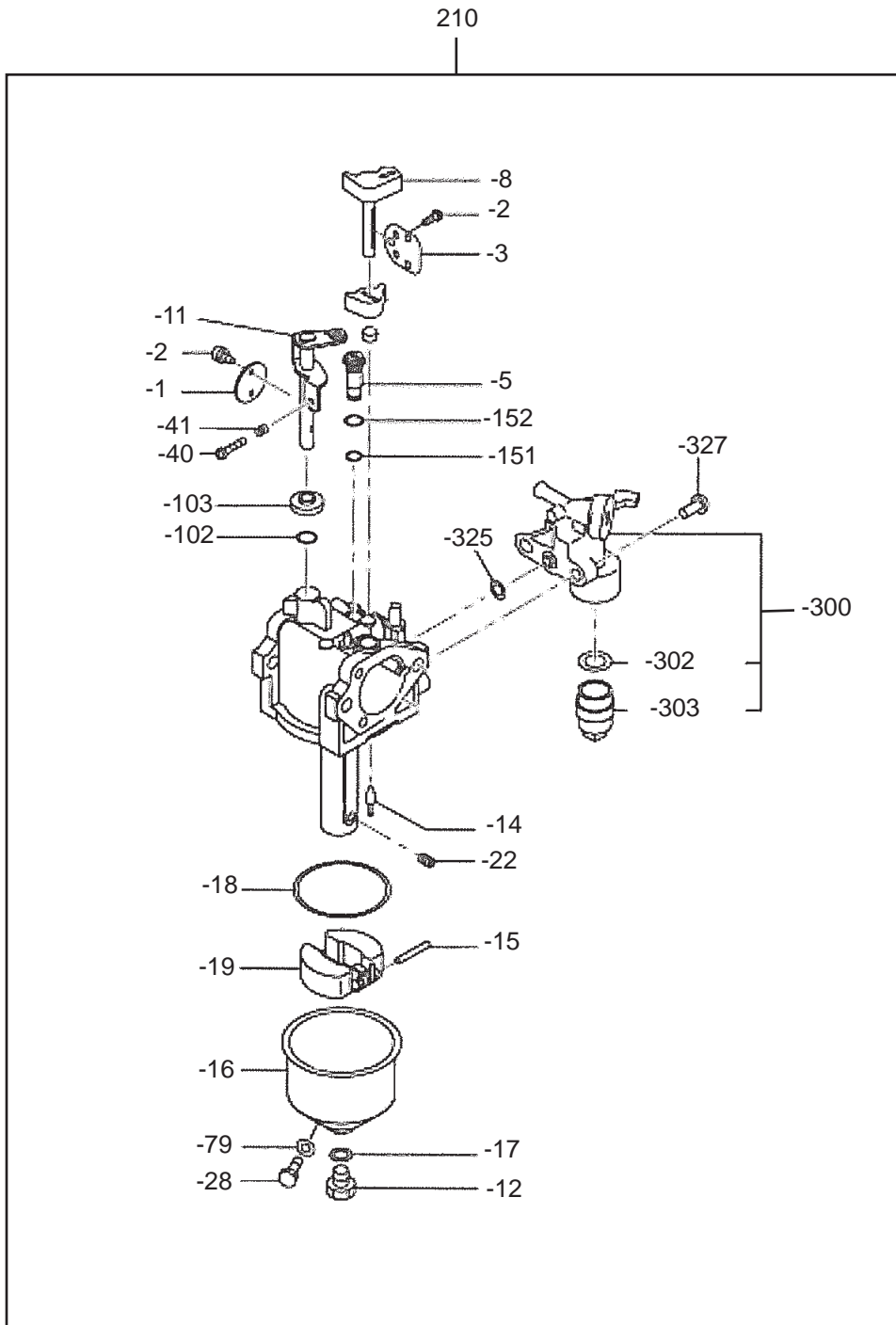


FIG. 620

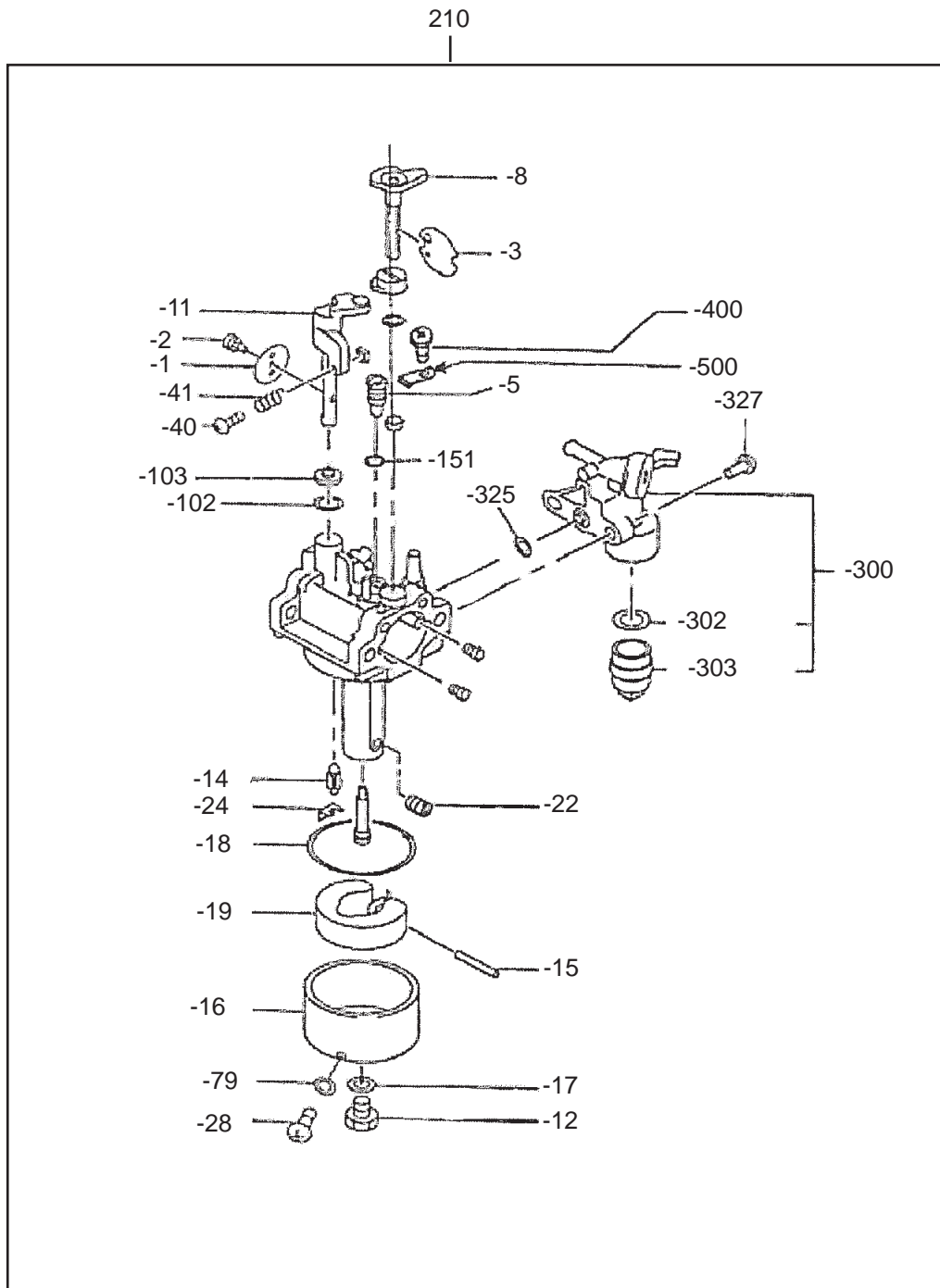


FIG. 630

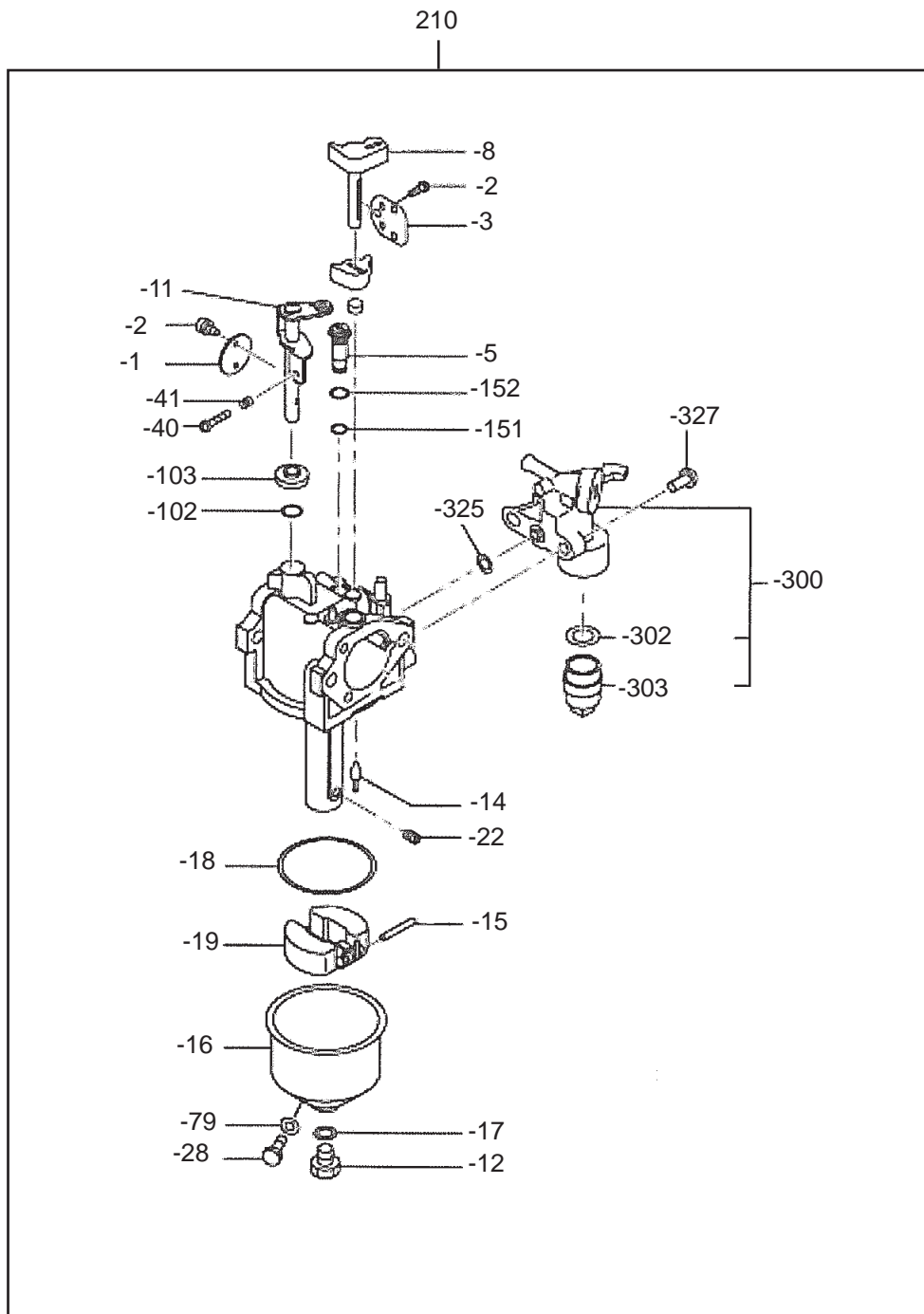


FIG. 640

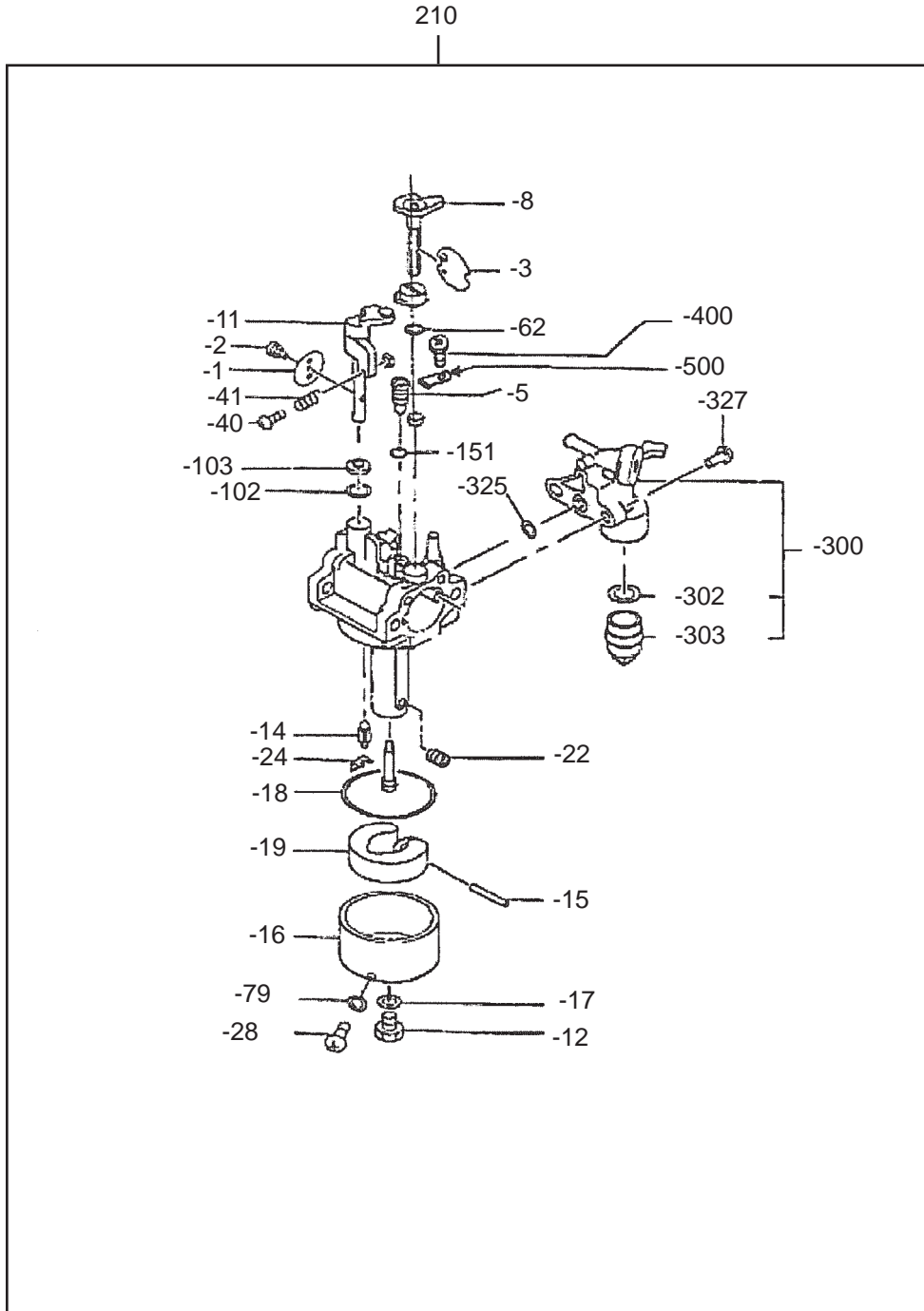


FIG. 650

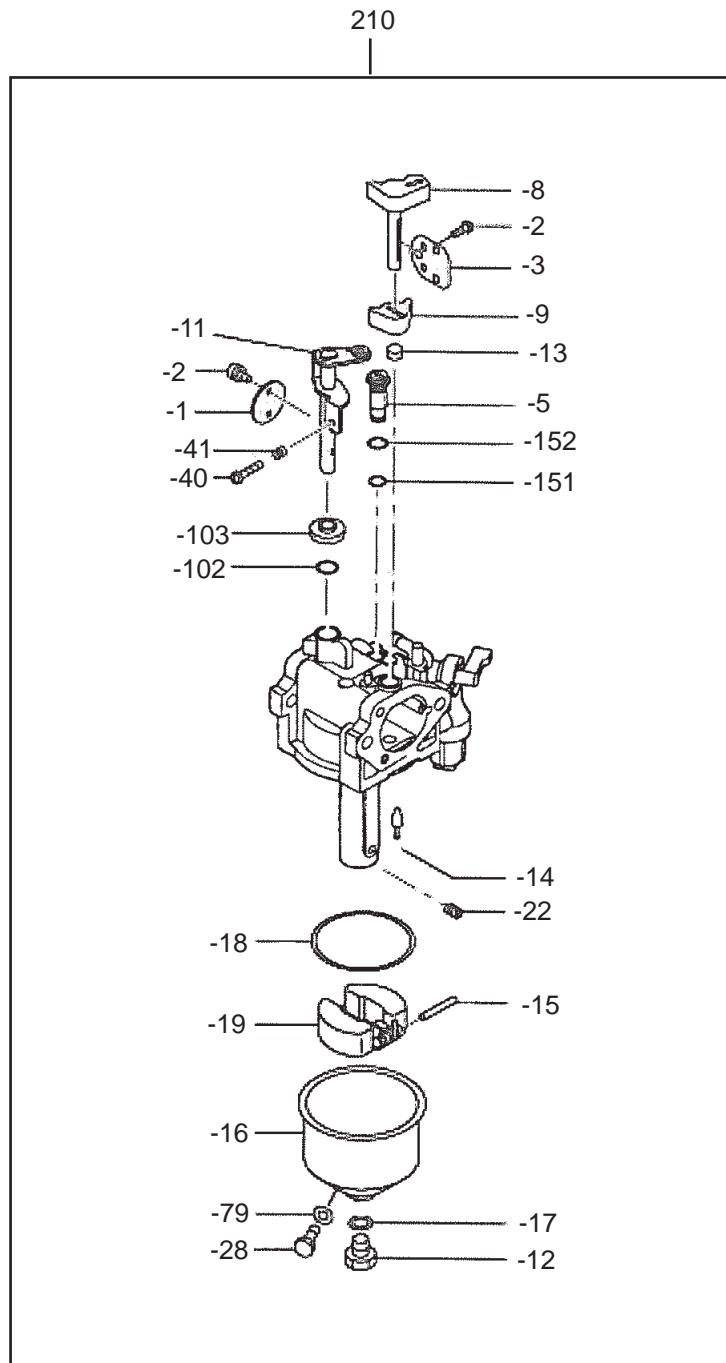
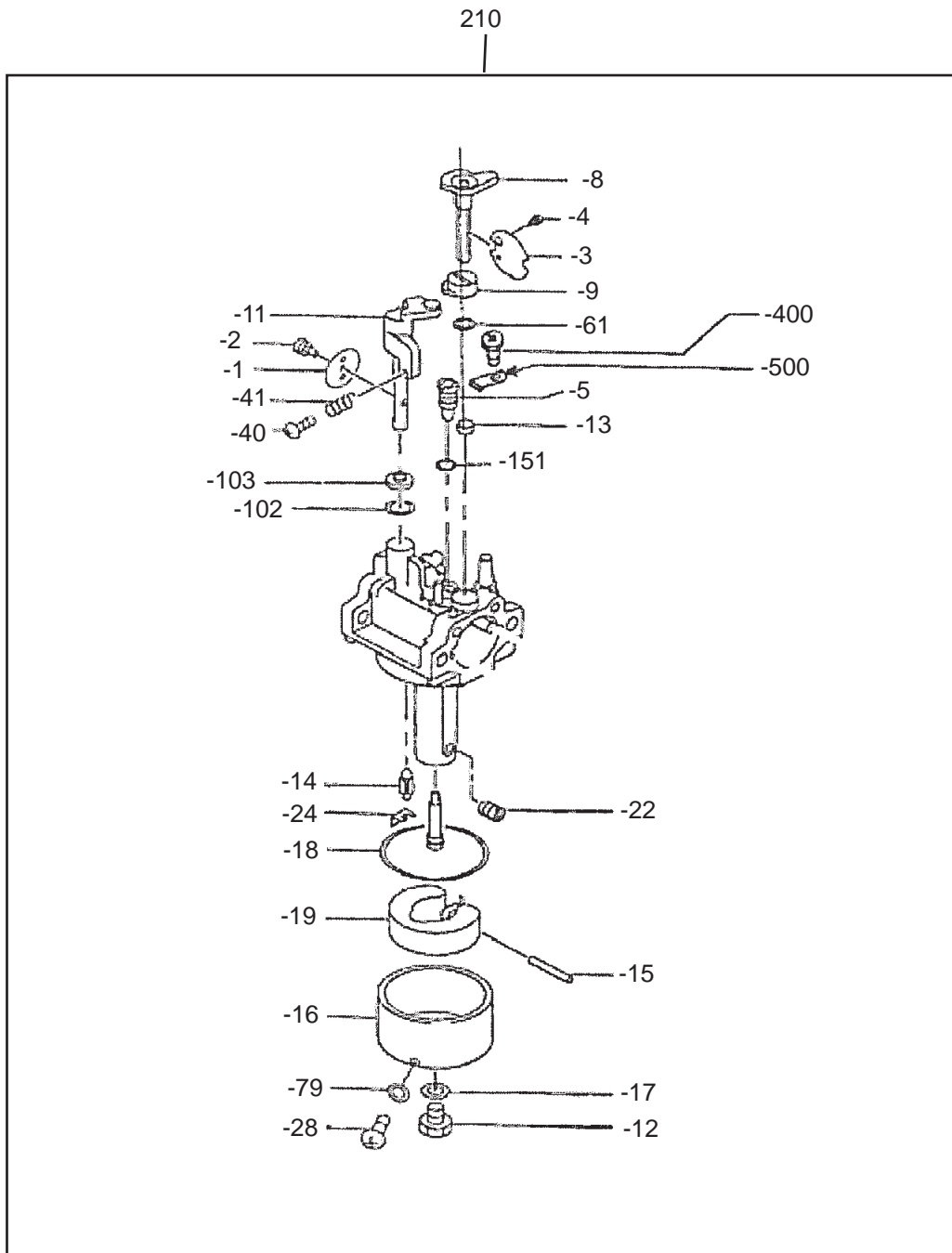


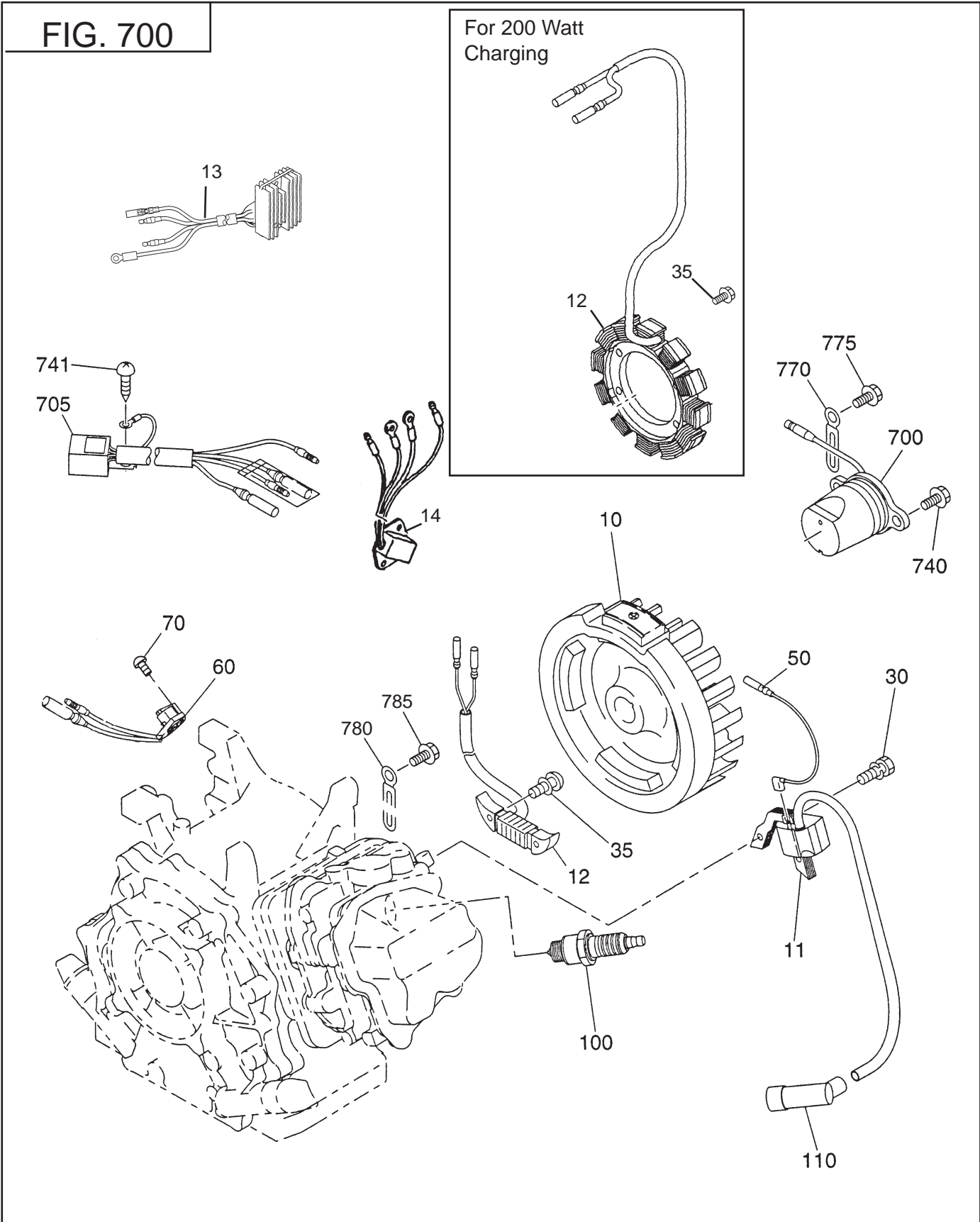
FIG. 660



SECTION 7 ELECTRIC DEVICE GROUP

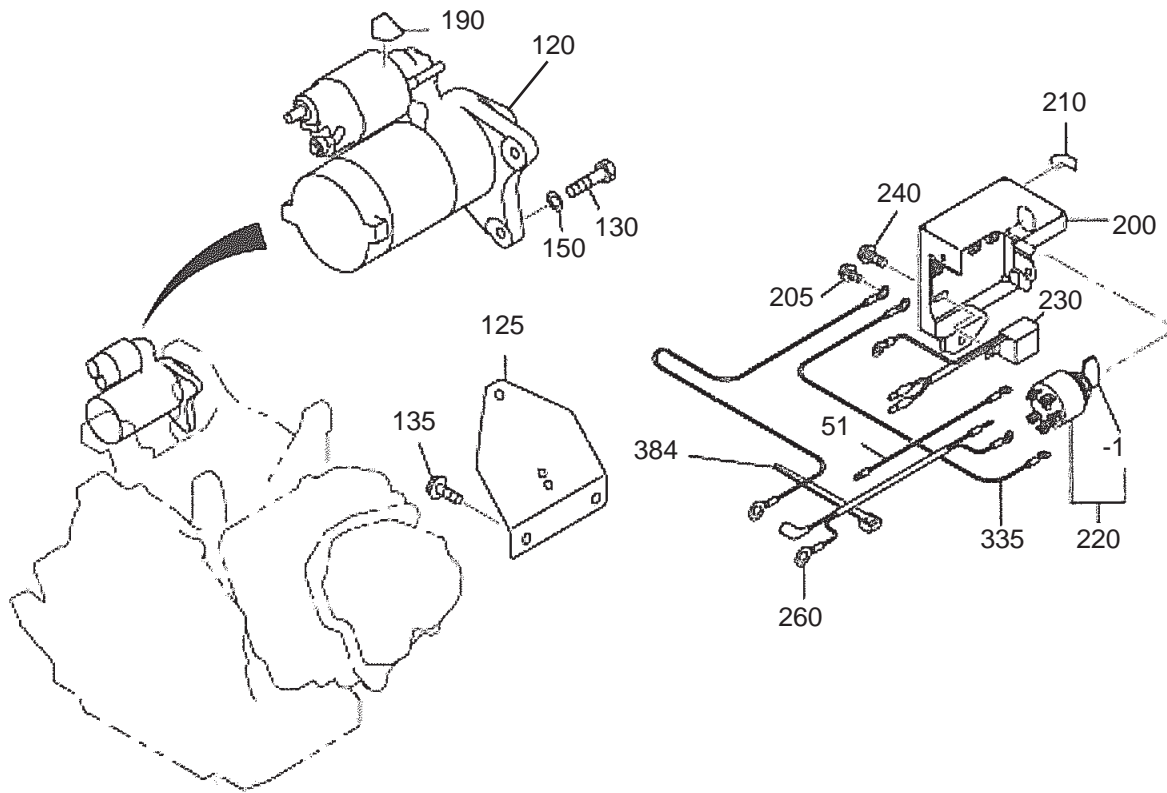
FIG. 700

For 200 Watt Charging



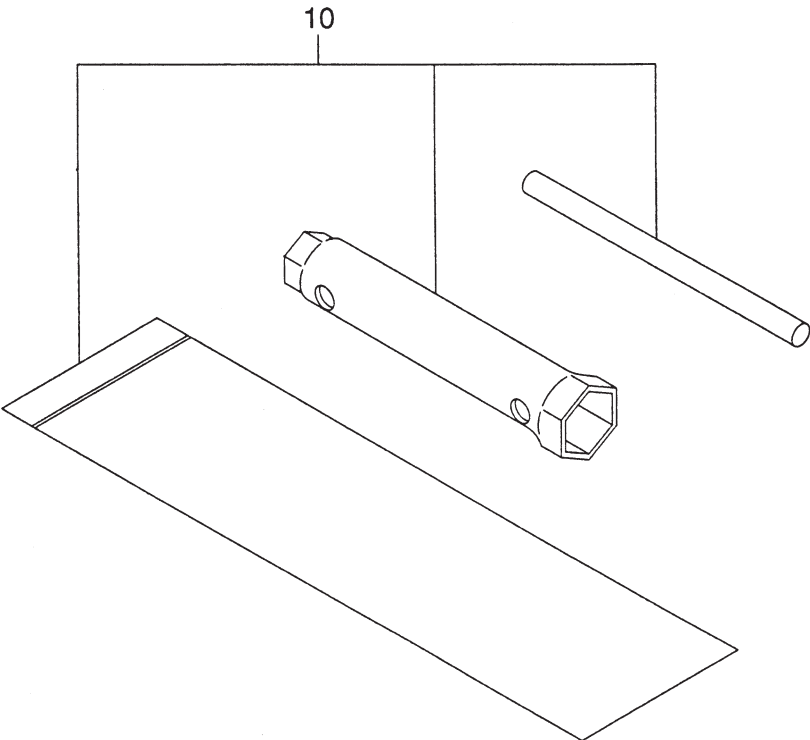
SECTION 7 ELECTRIC DEVICE GROUP - CONTROL BOX

FIG. 710



SECTION 9 ACCESSORY GROUP

FIG. 900



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