



**Count on it.**

**Parts Catalog**

**TRX-20 Trencher**

Model No. 22973—Serial No. 314000301 and Up



# Ordering Replacement Parts

To order replacement parts, please supply the part number, the quantity, and the description of each part desired.

## Understanding Reference Numbers

Each identified part in an illustration has a reference number. The reference number for a part also appears in the parts list, along with other information about the part.

This catalog uses two special reference number formats, one to indicate parts in a service assembly and another to indicate the quantity of a given part in an illustration.

## Service Assembly Reference Numbers

Parts in service assemblies have reference numbers in the form a:b. The a represents the reference number of the entire service assembly and the b represents a sequential number unique to each part within the service assembly.

For example, a wheel assembly might be identified by reference number 6, the tire by 6:1, the valve by 6:2, and the wheel by 6:3. When you order the assembly identified by reference number 6, you receive all parts identified by reference numbers 6:1, 6:2, and 6:3. However, you may also order any part individually. Reference numbers of this type appear in illustration and in parts lists.

## Reference Numbers Indicating Quantity

In an illustration, if a reference number indicates more than one part, the reference number has the form nX y. The n represents the quantity of the part, the X is the multiplication symbol, and the y represents the reference number.

For example, in an illustration, the reference number 2X 37 means that two of the parts identified by reference number 37 are indicated.

# List of Abbreviations

**AR:** as required

**ASM:** assembly

**BBC:** blade brake control

**BHTF:** button head thread forming

**CARR:** carriage

**CCW:** counter clockwise

**CW:** clockwise

**DEG:** degrees

**DPA:** Dual Point Adjustment

**ECM:** electronic control module

**EXT:** external

**FH:** flat head

**GA:** gauge

**HD:** heavy-duty

**HF:** hex flange

**HH:** hex head

**HHF:** hex head flange

**HHFTF:** hex head flange thread forming

**HJ:** hex jam

**HLH:** hex lag head

**HOC:** height-of-cut

**HP:** high pressure

**HSBH:** hex socket button head

**HSFH:** hex socket flat head

**HSH:** hex socket head

**HWH:** hex washer head

**HWHTF:** hex washer head thread forming

**HYD:** hydraulic

**LH:** left hand

**LP:** low pressure

**LPG:** Liquefied Petroleum Gas

**NI:** nylon insert

**NPTF:** national pipe thread fine

**PFH:** phillips flat head

**PPH:** phillips pan head

**PPHTF:** phillips pan head thread forming

**PRH:** phillips round head

**PTH:** phillips truss head

**PTO:** power-take-off

**RH:** right hand

**ROPS:** roll-over protection system

**RRB:** rear roller brush

**SFH:** slotted fillister head

**SHH:** slotted hex head

**SHWH:** slotted hex washer head

**SPH:** slotted pan head

**SQH:** square head

**SRH:** slotted round head

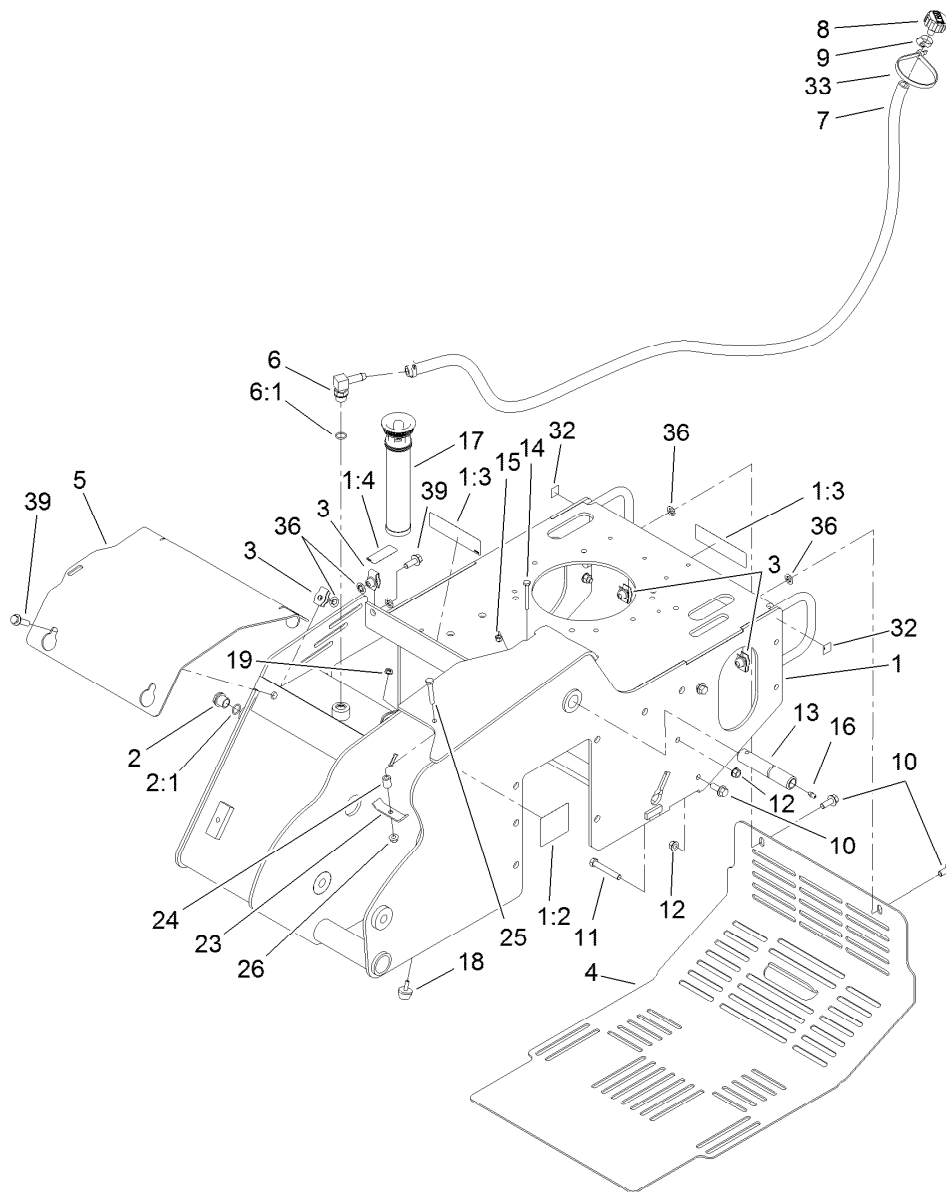
**STD:** standard

**TAP:** self tapping

**TTH:** torx truss head

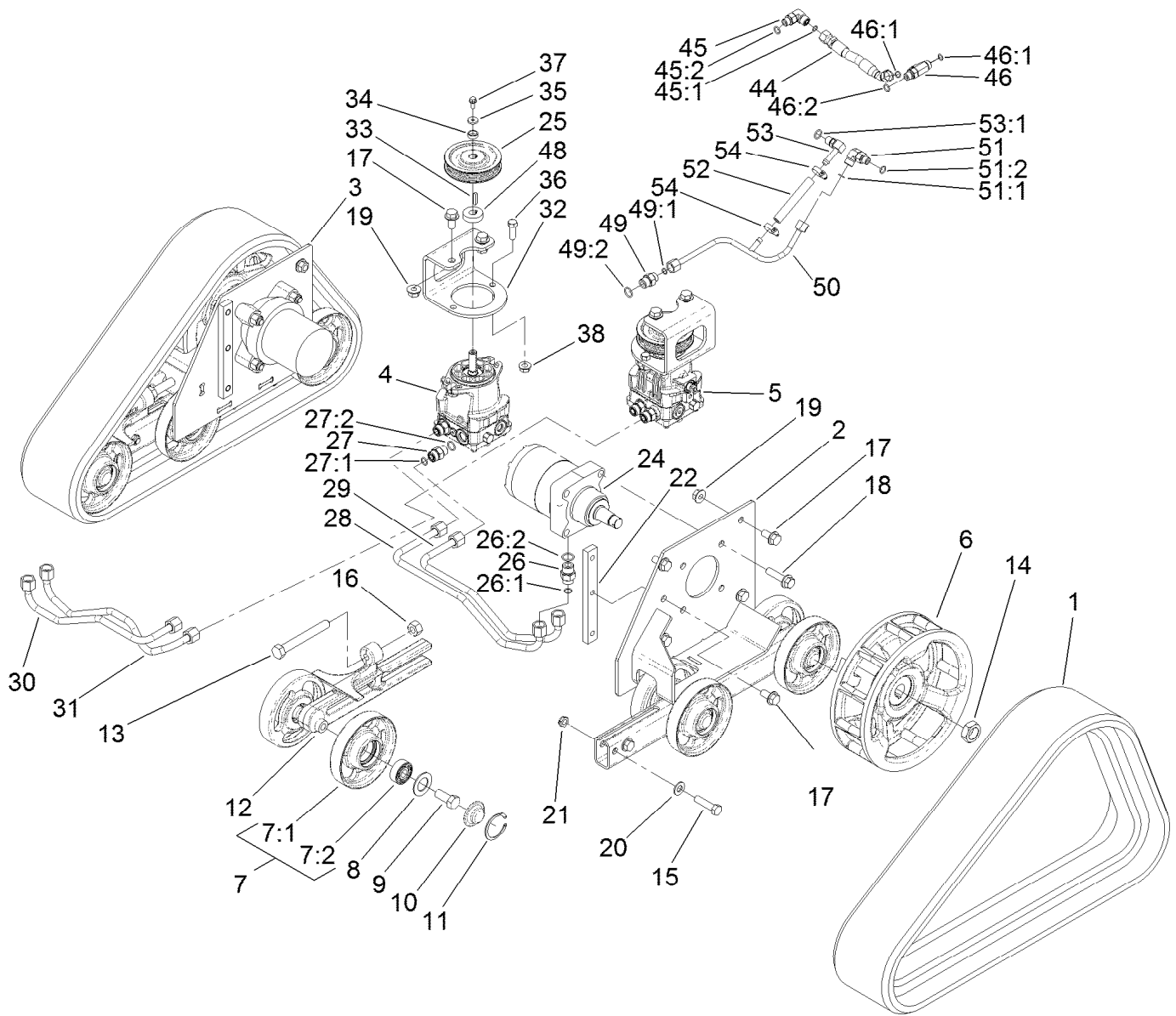
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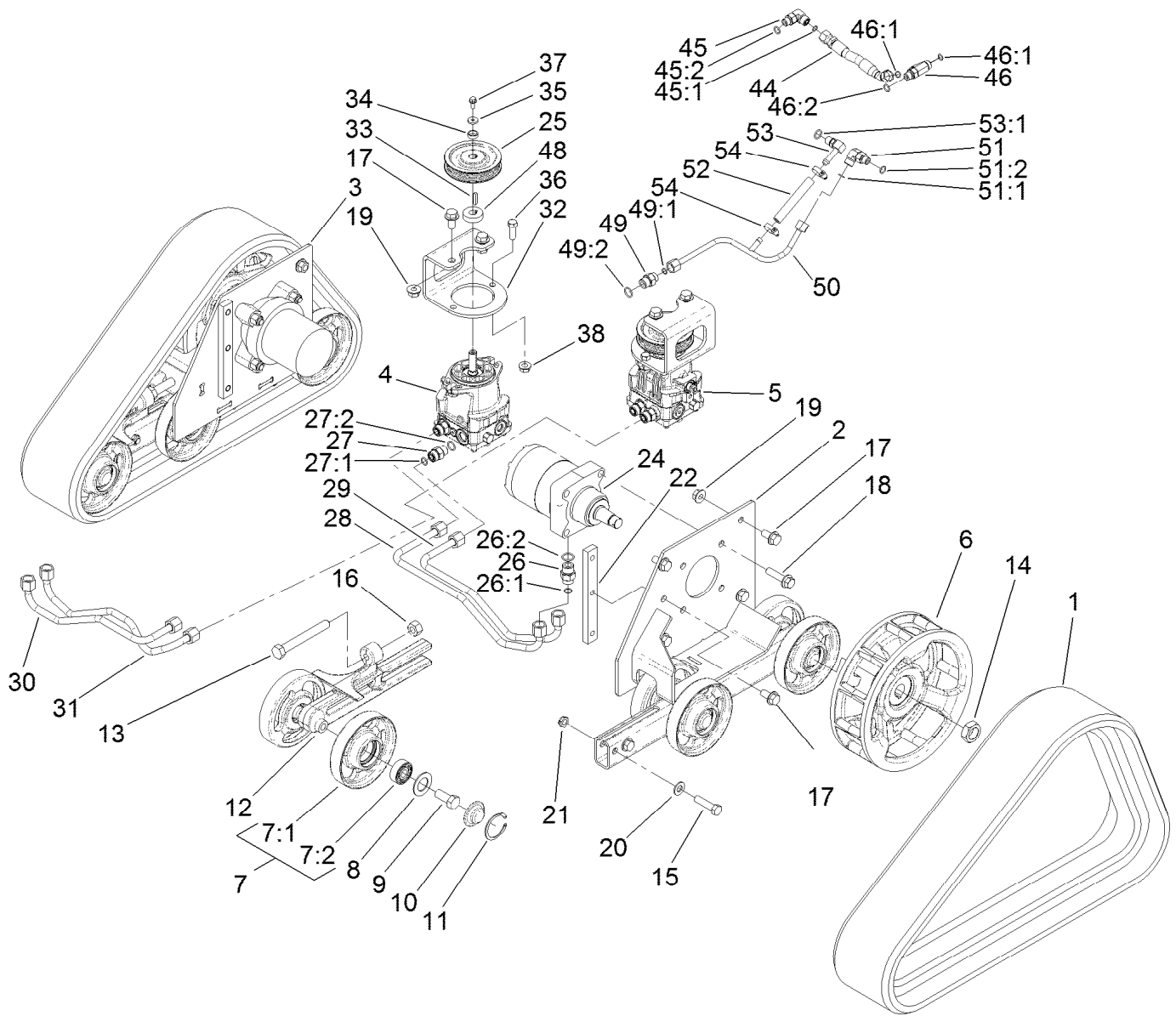
## Main Frame Assembly

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	127-9602	1	Main Frame ASM	12	32128-40	2	Nut-Flange
1:2	100-4650	1	Decal-Warning	13	120-7352	1	Pin-Pivot
1:3	93-7814	2	Decal-Danger	14	321-18	1	Screw-HH
1:4	93-6686	1	Decal-Oil, HYD	15	3296-42	1	Nut-Lock, NI
2	114-3075	1	Sight Glass ASM	16	302-5	1	Fitting-Grease
2:1	237-79	1	O-Ring	17	114-3039	1	In-Tank Filter ASM
3	105-4886	5	Nut-Tinnerman	18	1-523420	1	Bumper
4	115-6503-01	1	Cover-Rear	19	32128-33	1	Nut-HF
5	119-4566-03	1	Plate-Cover, Front	23	100-4860	1	Bracket-Clamp
6	354-120	1	Fitting-HYD, 90 DEG	24	93-5023	1	Spacer
6:1	237-79	1	O-Ring	25	322-10	1	Screw-HH
7	114-3042	1	Hose-Breather	26	32128-20	1	Nut-HF
8	68-6150	1	Breather	32	93-9084	2	Decal-Point, Lift
9	2412-36	2	Clamp-Hose	33	3334-945	1	Tie-Cable
10	3234-11	2	Screw-HHF	36	107-3154	5	Nut-Push
11	323-12	1	Screw-HH	39	3234-18	3	Screw-HHF



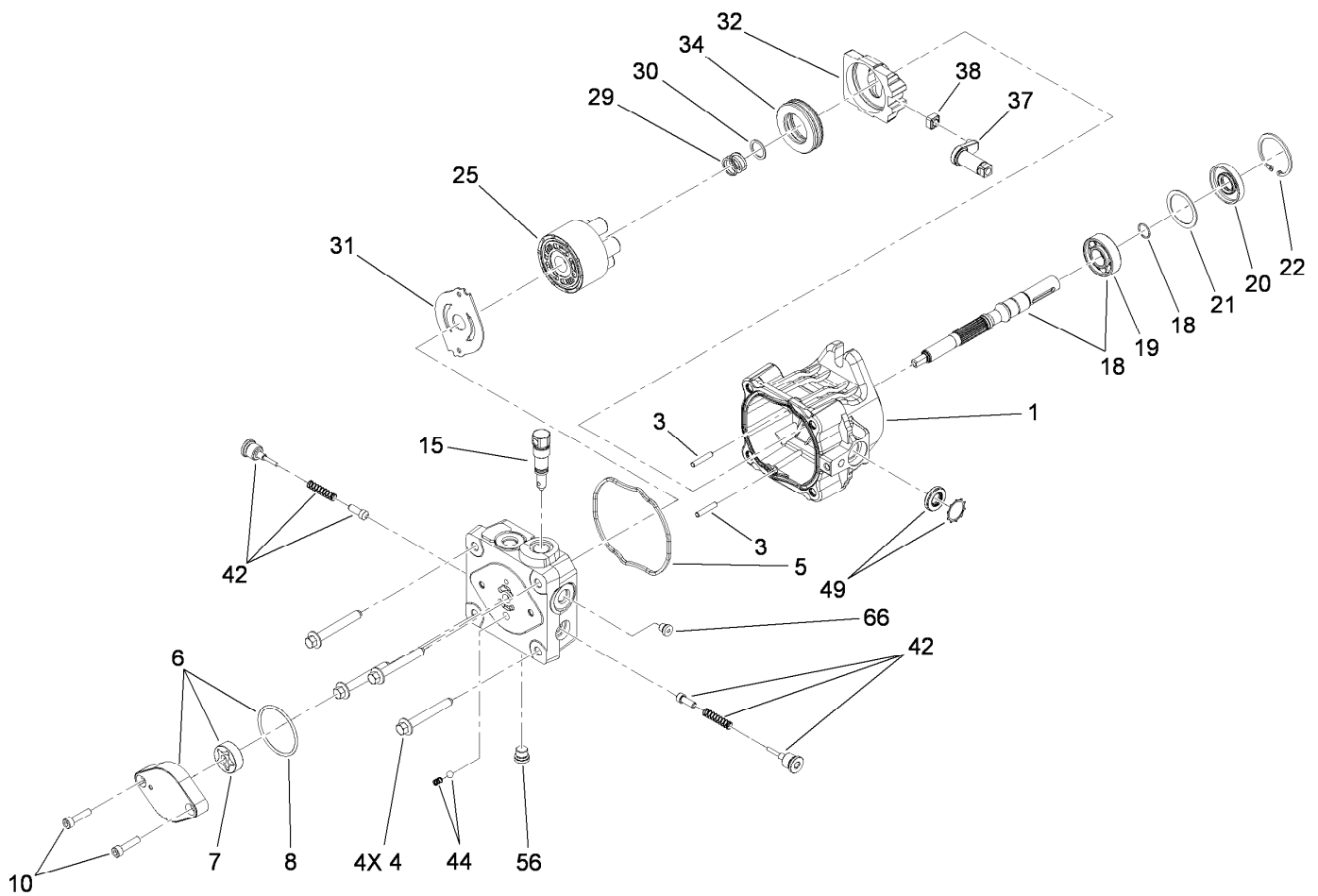
## Track and Drive Assembly

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	112-4816	2	Track-Rubber	20	3256-26	4	Washer-Flat
2	114-2992-03	1	Frame-Track, LH	21	3296-45	4	Nut-Lock, NI
3	114-2993-03	1	Frame-Track, RH	22	114-3091	2	Bar-Thread
4	117-6409	1	RH HYD Pump ASM	24	104-8470	2	HYD Wheel Motor ASM
5	117-6410	1	LH HYD Pump ASM	25	115-1298	2	Sheave
6	117-6426-03	2	Wheel-Drive	26	340-6	4	Fitting-HYD, Straight
7	112-4817	12	Wheel-Tensioner	26:1	237-30	1	O-Ring
7:1	114-3014-03	1	Wheel-Track	26:2	237-80	1	O-Ring
7:2	120-5378	1	Bearing-Ball	27	340-4	4	Fitting-HYD, Straight
8	106-7585	12	Gasket-Bogie	27:1	237-30	1	O-Ring
9	327-4	12	Screw-HH	27:2	237-79	1	O-Ring
10	106-7557	12	Cap-Wheel, Bearing	28	115-1285	1	Tube-HYD
11	106-7595	12	Ring-Snap, Internal	29	115-1286	1	Tube-HYD
12	114-3077-03	2	Tensioner-Track	30	115-1287	1	Tube-HYD
13	112-4874	2	Screw-HH, TAP	31	115-1288	1	Tube-HYD
14	106-8159	2	Nut-Lock	32	115-1289-03	2	Bracket-Mount, Pump
15	325-8	4	Screw-HH	33	80-6090	2	Key-Pump
16	3217-11	2	Nut-Hex	34	108-4211	2	Bushing
17	3234-6	10	Screw-HHF	35	73-3580	2	Washer
18	3234-27	8	Screw-HHF	36	324-5	4	Screw-HH
19	32128-49	8	Nut-HHF	37	33103-016	2	Screw-HHF



## Track and Drive Assembly (continued)

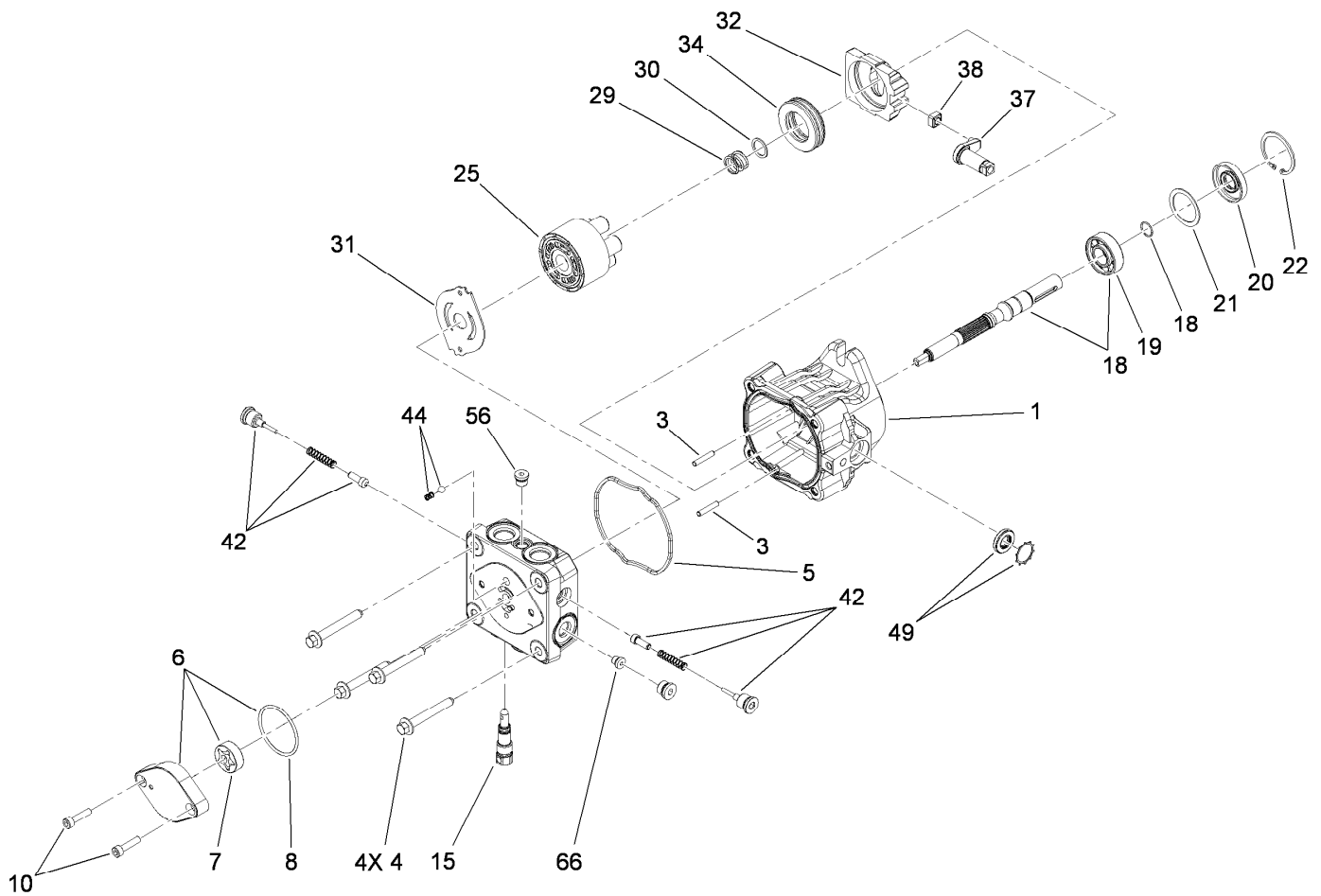
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
38	32128-42	4	Nut-HF	49:1	237-22	1	O-Ring
44	115-1297	1	Hose-HYD	49:2	237-79	1	O-Ring
45	340-77	1	Fitting-HYD, 90 DEG	50	117-1305	1	Tube-HYD
45:1	237-22	1	O-Ring	51	340-77	1	Fitting-HYD, 90 DEG
45:2	237-42	1	O-Ring	51:1	237-22	1	O-Ring
46	340-86	1	Fitting-Tee	51:2	237-42	1	O-Ring
46:1	237-22	2	O-Ring	52	115-4083	1	Hose
46:2	237-42	1	O-Ring	53	100-4887	1	Fitting-Barbed, 90 DEG
48	115-4002	2	Spacer	53:1	237-42	1	O-Ring
49	340-3	1	Adapter	54	2412-36	2	Clamp-Hose



## Hydraulic Pump Assembly No. 117-6409

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	115-4464	1	Housing Kit	29	94-1936	1	Spring-Block
3	106-8753	2	Pin-Headless, Straight	30	94-1937	1	Washer-Thrust
4	106-8754	4	Bolt-HF	31	105-6185	1	Plate-Valve
5	106-8755	1	O-Ring	32	94-1907	1	Swashplate-Variable
6	106-8756	1	Charge Pump Kit	34	94-6922	1	Bearing-Thrust
7	104-2122	1	Gerotor ASM	37	115-4458	1	Arm-Trunnion, Tapered Square
8	106-8757	1	O-Ring	38	94-1910	1	Guide-Slot
10	104-2111	2	Capscrew	42	98-3252	2	Valve-Check (W/Poppet)
15	106-8759	1	Bypass Valve Kit	44	106-8760	1	Charge Relief Valve Kit
18	103-2664	1	Input Shaft Kit	49	114-8155	1	Trunnion Seal Kit
19	104-5311	1	Bearing-Ball	56	106-8762	1	Plug-HSH
20	104-5310	1	Seal-Lip	66	106-8763	1	Plug-HSH
21	104-5308	1	Spacer	99	105-6184	1	Seal Overhaul Kit ●
22	104-5309	1	Ring-Retaining				
25	103-2666	1	Cylinder Block Kit				

● Not illustrated



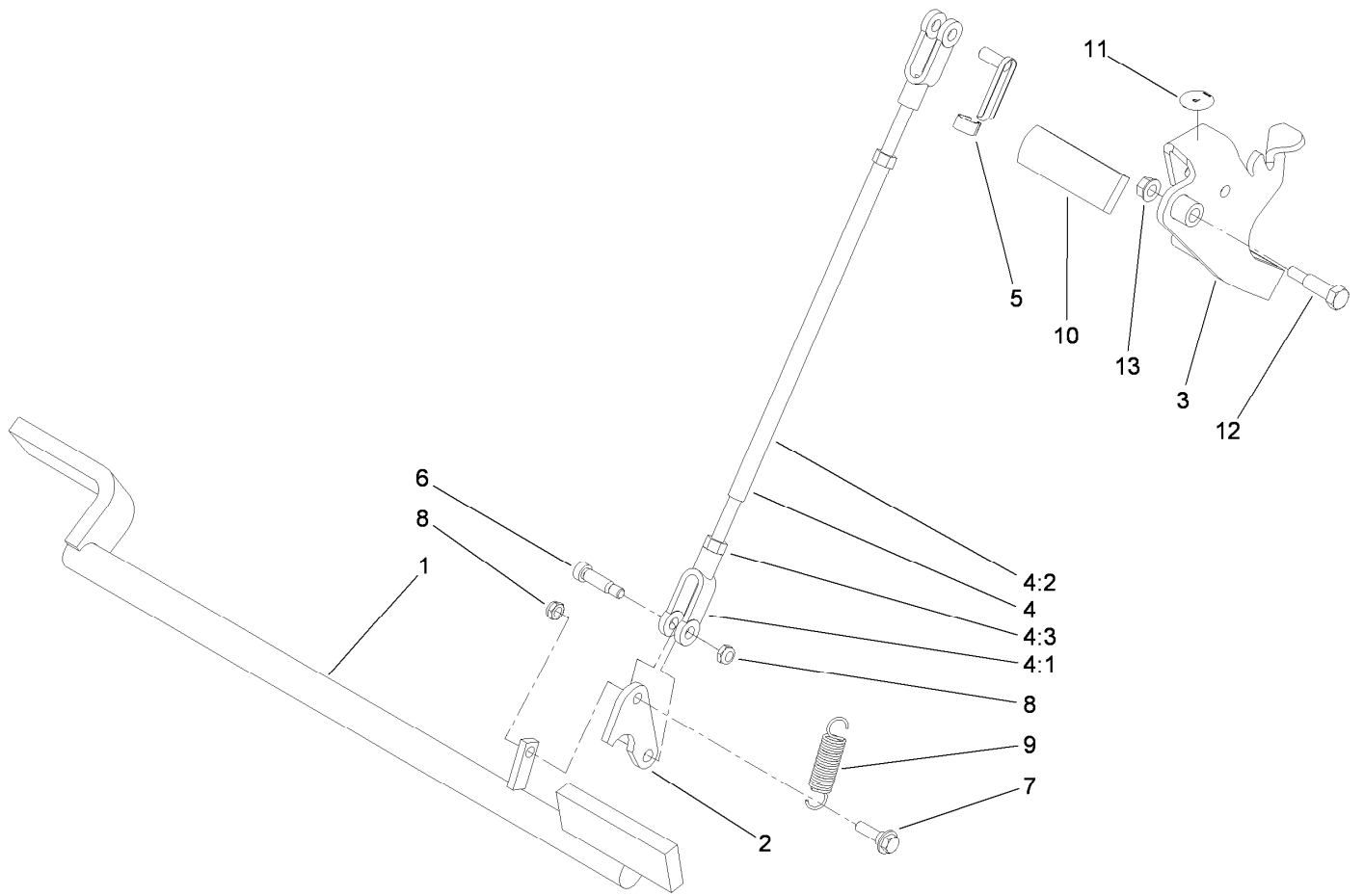
## Hydraulic Pump Assembly No. 117-6410

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	115-4464	1	Housing Kit	29	94-1936	1	Spring-Block
3	106-8753	2	Pin-Headless, Straight	30	94-1937	1	Washer-Thrust
4	106-8754	4	Bolt-HF	31	105-6185	1	Plate-Valve
5	106-8755	1	O-Ring	32	94-1907	1	Swashplate-Variable
6	106-8756	1	Charge Pump Kit	34	94-6922	1	Bearing-Thrust
7	104-2122	1	Gerotor ASM	37	115-4458	1	Arm-Trunnion, Tapered Square
8	106-8757	1	O-Ring	38	94-1910	1	Guide-Slot
10	104-2111	2	Capscrew	42	98-3252	2	Valve-Check (W/Poppet)
15	106-8759	1	Bypass Valve Kit	44	106-8760	1	Charge Relief Valve Kit
18	103-2664	1	Input Shaft Kit	49	114-8155	1	Trunnion Seal Kit
19	104-5311	1	Bearing-Ball	56	106-8762	1	Plug-HSH
20	104-5310	1	Seal-Lip	66	106-8763	1	Plug-HSH
21	104-5308	1	Spacer	99	105-6184	1	Seal Overhaul Kit ●
22	104-5309	1	Ring-Retaining				
25	103-2666	1	Cylinder Block Kit				

● Not illustrated

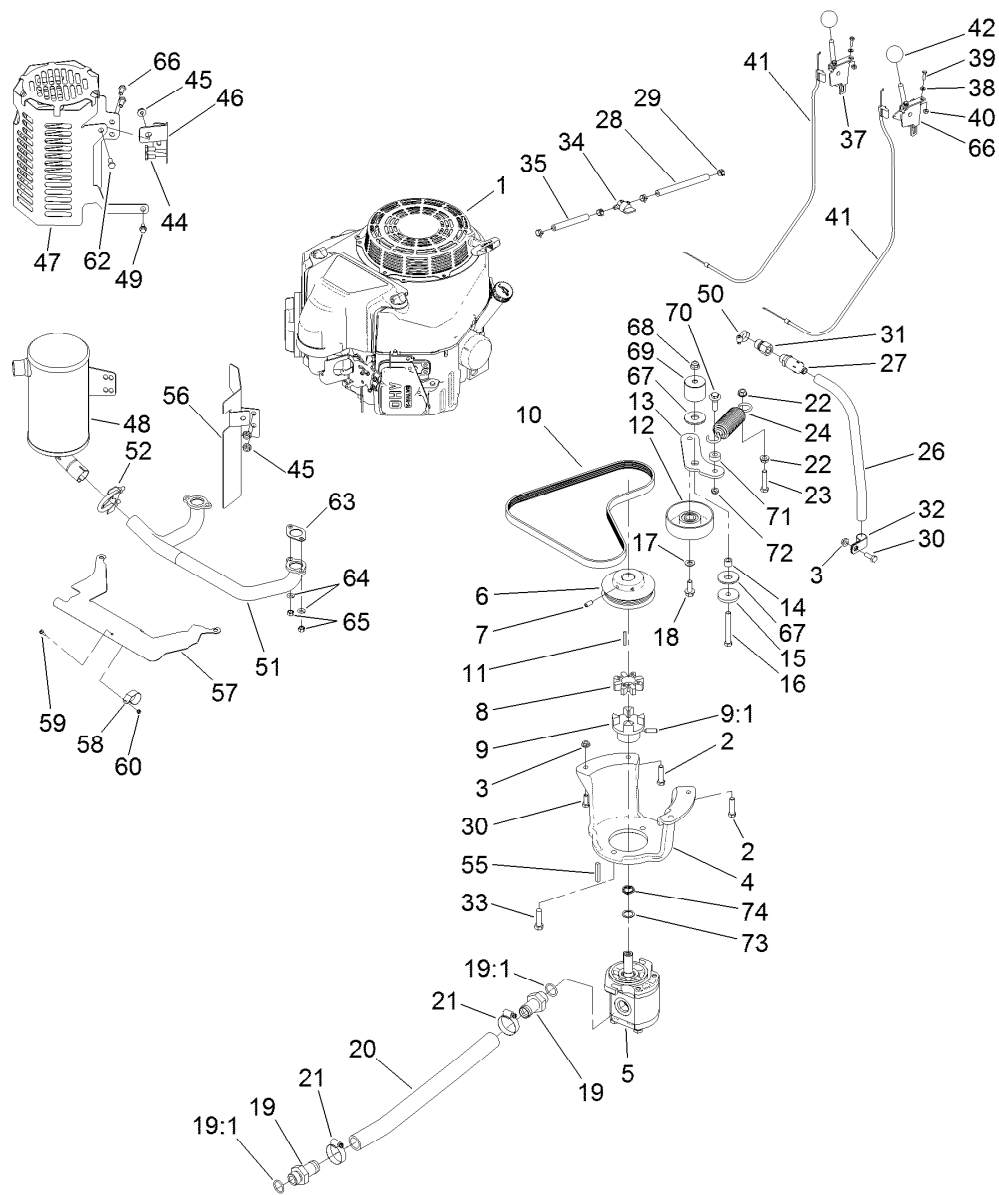






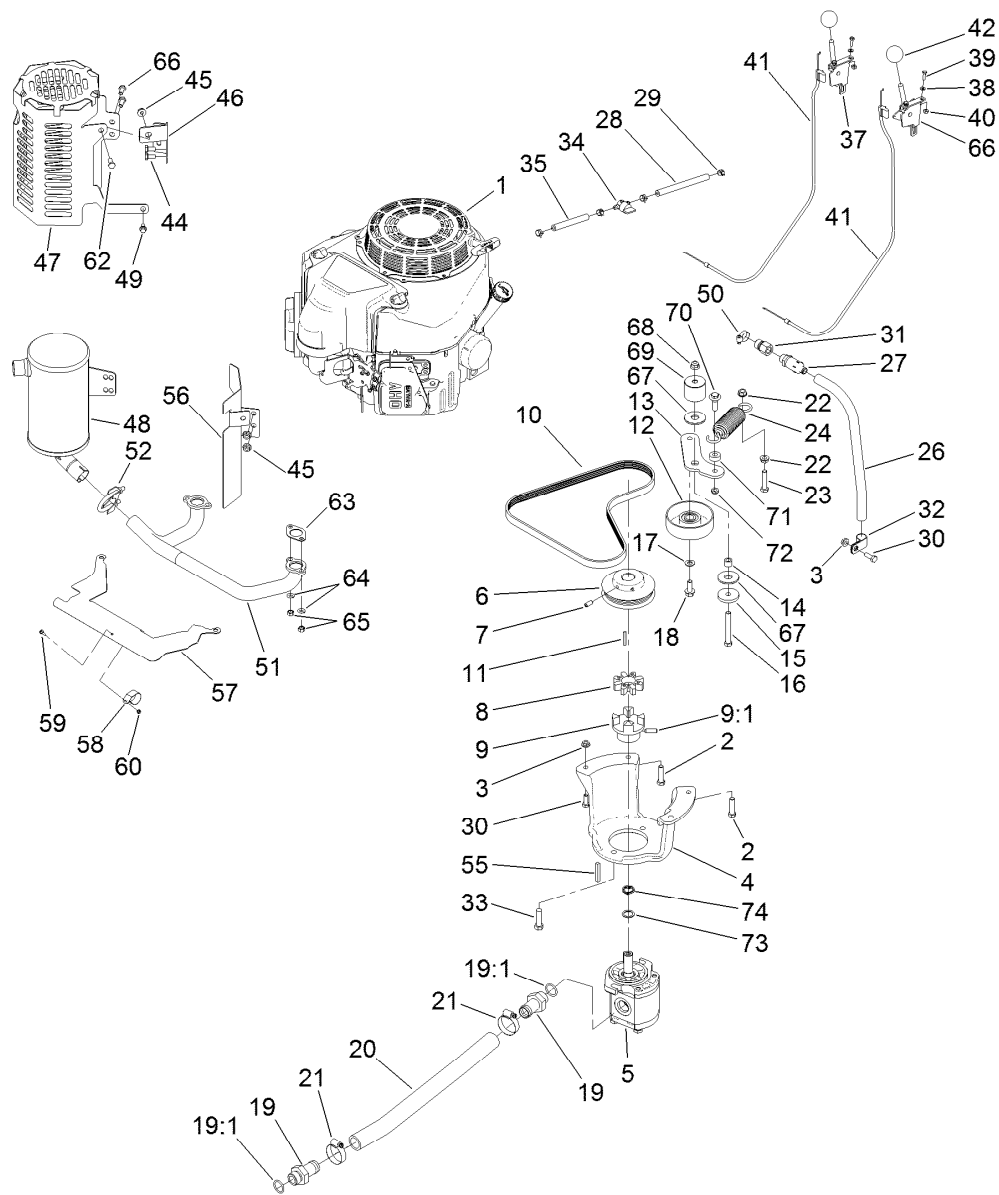
## Parking Brake Assembly

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
1	114-2972-03	1	Bar-Brake	6	114-8629	1	Bolt-Shoulder
2	114-2975	1	Link-Mounting	7	27-7211	1	Screw-Shoulder
3	117-6421-03	1	Handle-Brake	8	3296-47	2	Nut-Lock, NI
4	103-4335	1	Brake Rod ASM	9	67-1450	1	Spring-Idler
4:1	1-633131	2	Yoke-Linkage, Brake	10	62-9130	1	Grip-Handle
4:2	103-3907	1	Linkage-Handle, Brake	11	107-8495	1	Decal-Parking Brake
4:3	3219-3	2	Nut-Hex	12	7-0030	1	Screw-Shoulder, HH
5	103-2399	1	Pin-Spring, Clevis	13	32128-20	1	Nut-HF



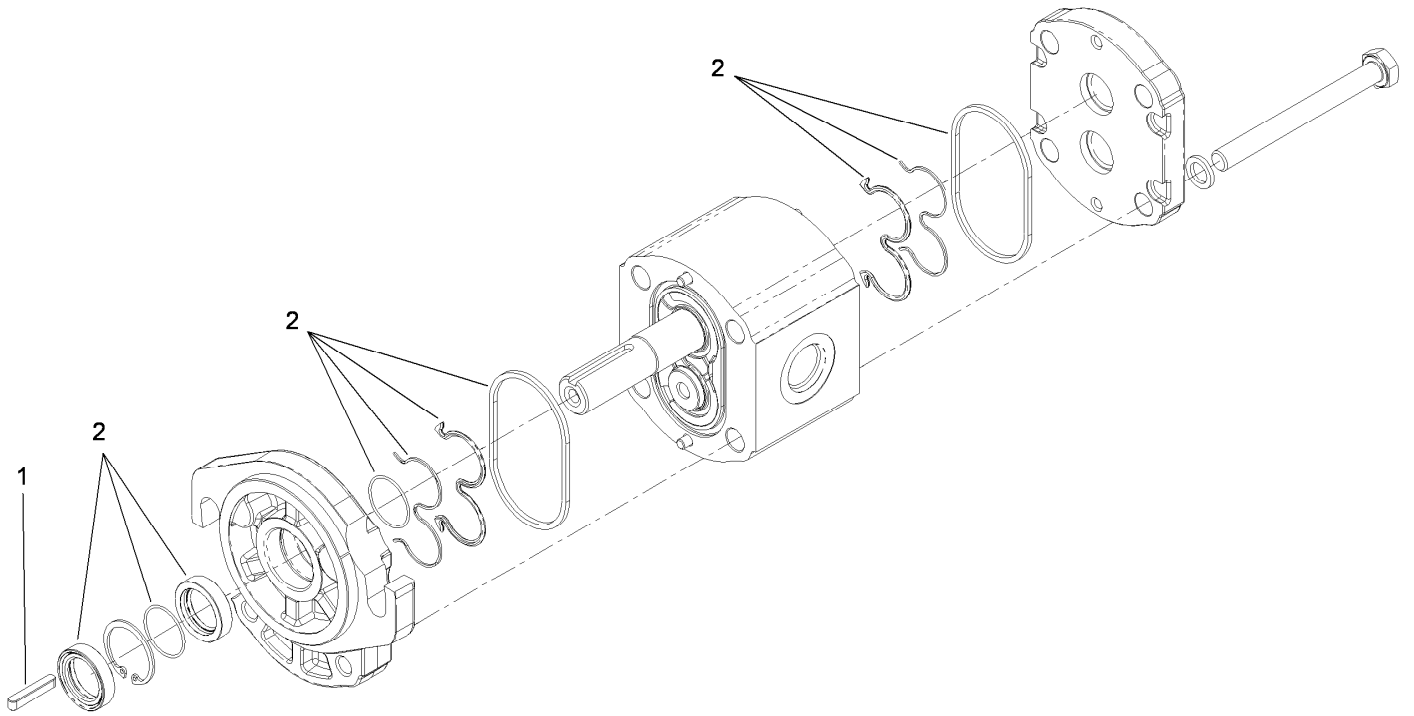
## Engine Assembly

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	117-6449	1	Engine-Kawasaki, Fs600V	20	114-2917	1	Hose-Suction
2	323-8	4	Screw-HH	21	2412-111	2	Clamp
3	32128-20	3	Nut-HF	22	3290-357	2	Nut-HHF, Whiz
4	115-1480-03	1	Mount-Pump	23	323-9	1	Screw-HH
5	114-3072	1	Gear Pump ASM	24	121-4523	1	Spring-Extension
6	114-8559-03	1	Pulley-Engine	26	106-5709	1	Hose-Vent
7	3246-6	2	Screw-Set, HSH	27	92-6877	1	Valve-Drain, Oil
8	93-8827	1	Spider-Coupler	28	109-0306	1	Hose-Fuel
9	114-2933	1	Coupler-Flex	29	2412-98	4	Clamp-Hose
9:1	100-7594	1	Screw-Set	30	322-4	3	Screw-HH
10	114-2991	1	Belt-V	31	103-1966	1	Adapter
11	608006	1	Key-Square	32	2412-81	1	Clamp-R
12	95-8802	1	Pulley-Idler	33	324-6	2	Screw-HH
13	125-0252	1	Arm-Idler	34	1-603770	1	Valve-Fuel
14	1-413088	1	Bushing-Lever, Lift	35	109-0295	1	Hose-Fuel
15	110-9981	1	Washer-Plain	37	108-9730	1	Lever-Control
16	323-14	1	Screw-HH	38	3256-21	4	Washer-Flat
17	3256-24	1	Washer-Flat	39	3290-134	4	Screw
18	3234-11	1	Screw-HHF	40	3296-2	4	Nut-Lock, NI
19	99-3017	2	Fitting	41	115-1211	2	Cable-Control
19:1	237-81	1	O-Ring	42	233-42	2	Knob



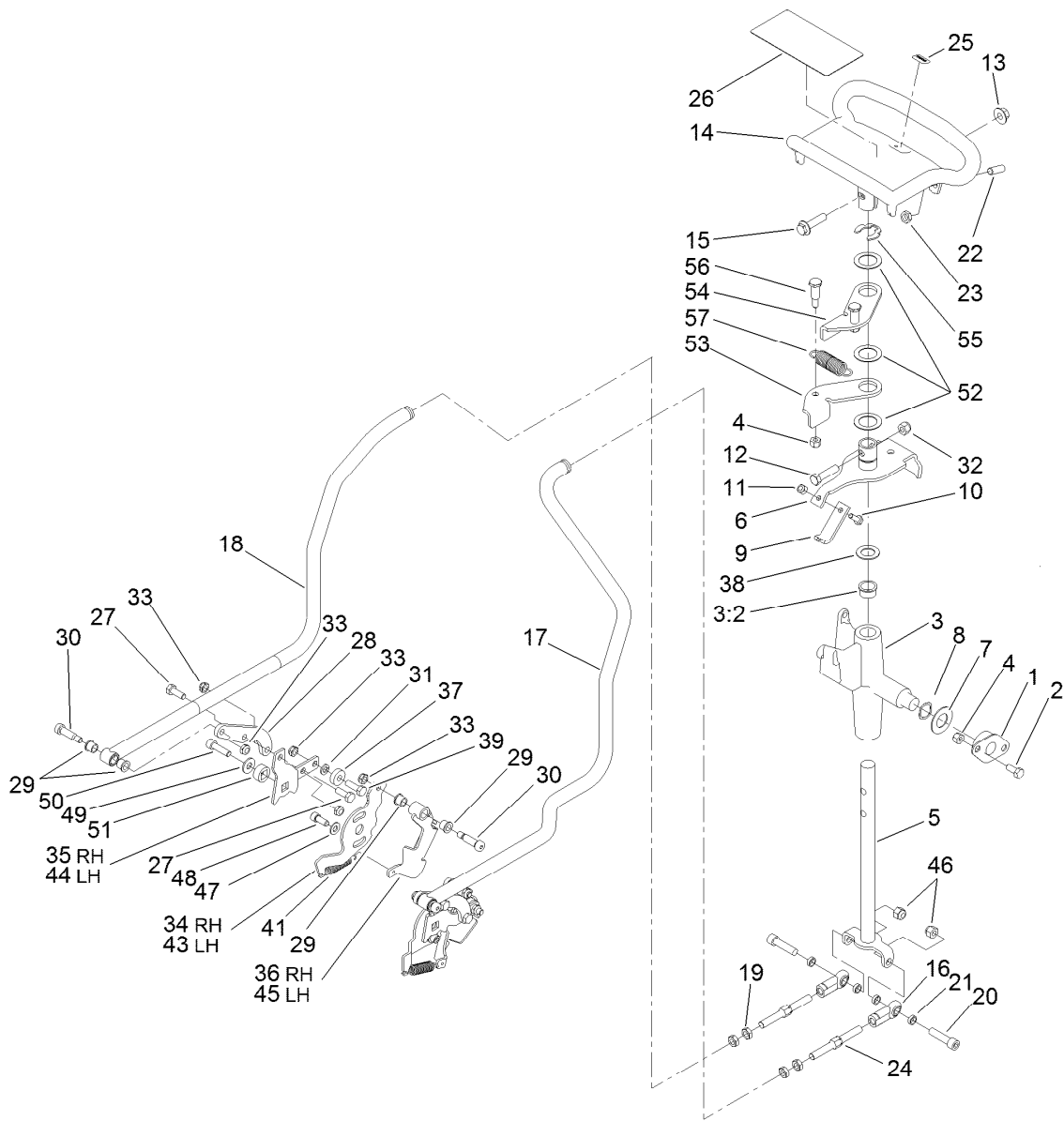
## Engine Assembly (continued)

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
44	33114-016	2	Screw-HH	60	115-6495	1	Nut-Hex
45	112-2844	3	Nut-HF	62	33114-020	3	Screw-HH
46	117-6278-03	1	Bracket-Guard, Muffler	63	1-653313	2	Gasket-Exhaust
47	117-6283-03	1	Shield-Muffler	64	115-6496	4	Washer-Spring
48	117-6319	1	Muffler	65	115-6611	4	Nut-Hex
49	33103-016	1	Screw-HHF	66	110-5547	1	Lever-Control
50	2412-36	1	Clamp-Hose	67	114-0463	2	Washer-Friction, Composite
51	117-6401	1	Manifold	68	104-8301	1	Nut-Flange, NI
52	2112-11	1	Clamp-Muffler	69	125-0251	1	Spacer-Idler
55	27-8590	1	Key-Square	70	614672	1	Bolt-Shoulder
56	117-6337	1	Bracket-Shield, Heat	71	104-8426	1	Spacer
57	117-6285	1	Plate-Shield, Heat	72	3296-59	1	Nut-Lock, NI
58	115-6488	1	Clamp	73	115-7210	1	Washer-Thrust
59	115-6494	1	Screw-Pan	74	121-4517	1	Washer-Wave



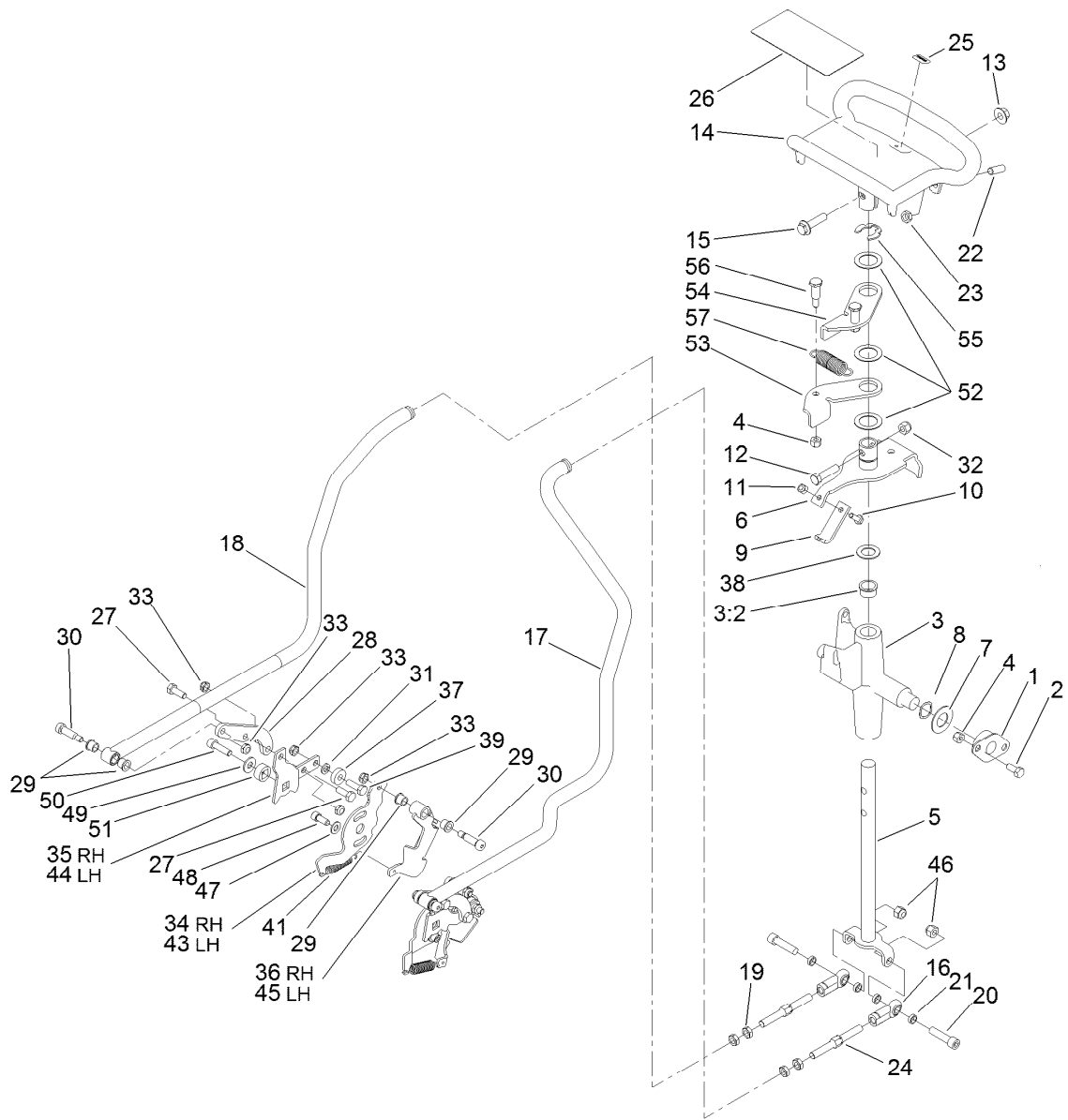
## Gear Pump Assembly No. 114-3072

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
1	104-5839	1	Key-Square
2	115-1265	1	Seal Kit



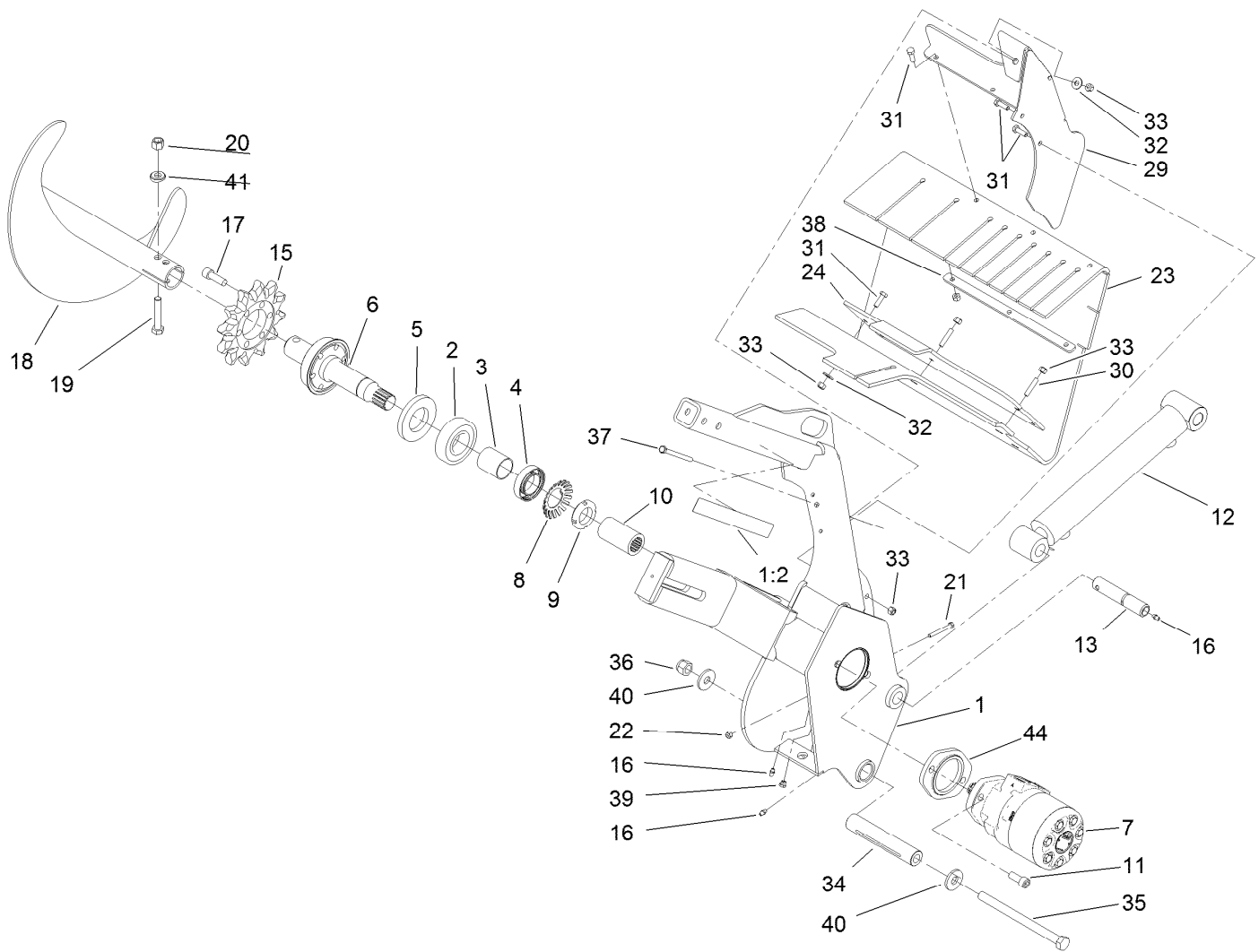
## Control Assembly

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	68-2970	2	Bushing	21	108-0634	4	Spacer-Plate, Retaining
2	322-3	4	Screw-HH	22	3247-6	2	Screw-Set
3	106-5737	1	Control Support ASM	23	3218-3	2	Nut-Jam
3:2	256-252	2	Bearing-Flange	24	121-4506	2	Link-Control, Adjustment
4	3296-29	6	Nut-Lock, NI	25	98-1459	1	Decal
5	117-6335	1	Rod-Drive	26	115-4020	1	Decal-Traction
6	112-2783	1	Lever-Pivot	27	322-4	4	Screw-HH
7	3256-39	2	Washer-Flat	28	115-1290	2	Plate-Adapter, Control, RH
8	95-3703	2	Washer-Spring, Wave	29	256-116	8	Bushing-Flange
9	115-1204	1	Plate-Neutral	30	114-8629	4	Bolt-Shoulder
10	321-4	1	Screw-HH	31	3253-4	2	Washer-Lock
11	3296-42	1	Nut-Lock, NI	32	3296-39	1	Nut-Lock, NI
12	323-8	1	Screw-HH	33	3296-47	10	Nut-Lock, NI
13	32128-43	1	Nut-Flange	34	115-6535	1	Plate-Base, RH
14	120-5380-03	1	Handle-Control	35	115-6536	1	Plate-Arm, Return
15	3234-18	1	Screw-HHF	36	115-6636	1	Pivot-RH
16	103-1167	2	Joint-Ball End, LH	37	251-259	2	Bearing-Ball
17	121-4508	1	Rod-Control, LH	38	257-8	1	Washer-Thrust
18	121-4509	1	Rod-Control, RH	39	322-5	2	Screw-HH
19	3220-3	4	Nut-HJ	41	121-4409	2	Spring-Extension
20	3274-2	2	Screw-HSH	43	115-6549	1	Plate-Base, LH



## Control Assembly (continued)

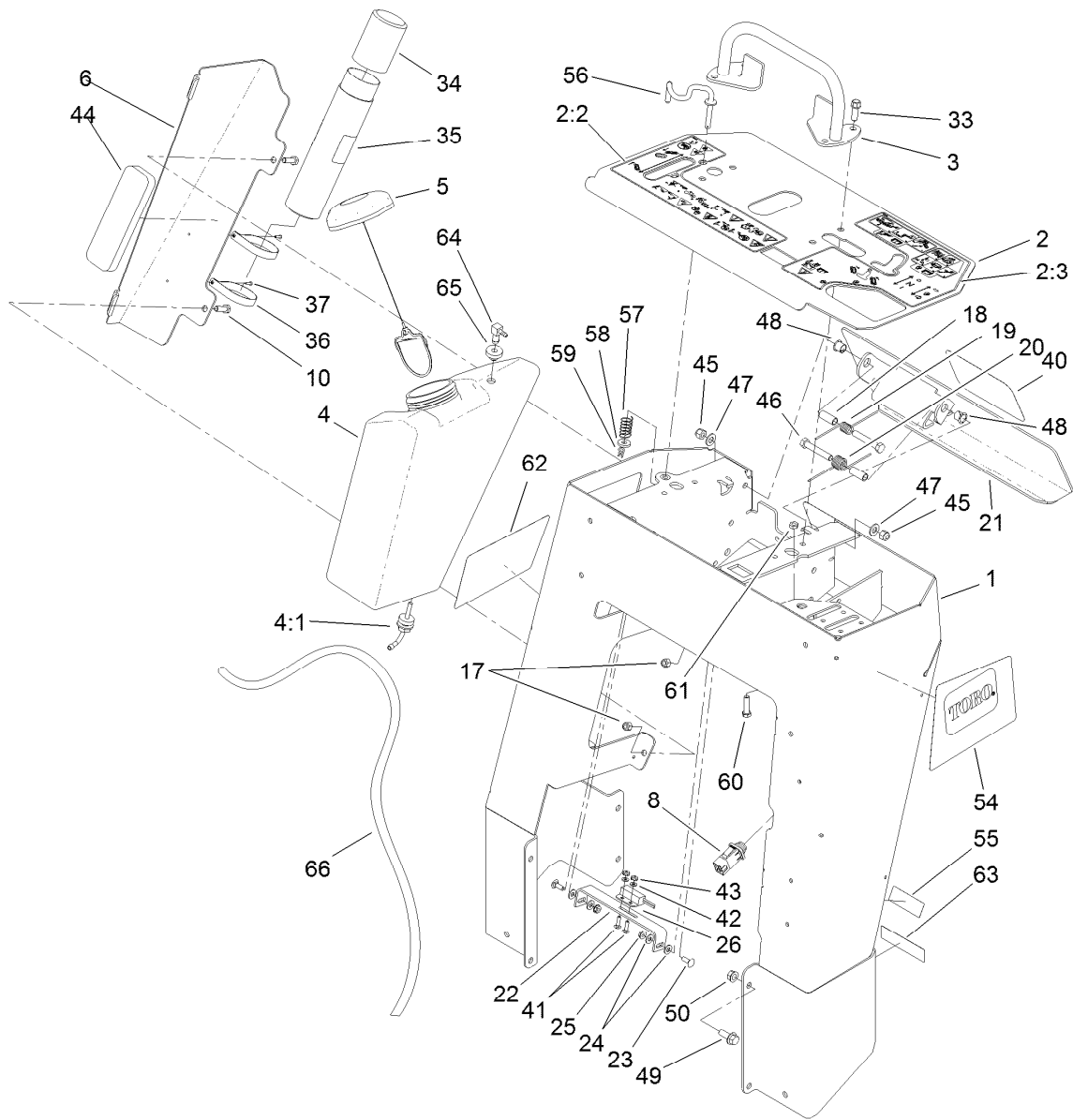
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
44	115-6628	1	Plate-Arm, Return, LH	51	117-6429	2	Lock-Trunion
45	115-6637	1	Pivot-LH	52	108-9743	3	Washer-Plain
46	3296-39	2	Nut-Lock, NI	53	98-8407	1	Lever-Return, RH
47	3290-456	2	Washer-Belleville	54	98-8408	1	Lever-Return, LH
48	3273-14	2	Screw-HSH	55	32151-91	1	Ring-Retaining
49	3256-3	2	Washer-Flat	56	63-2650	2	Screw-Shoulder
50	94-3559	2	Screw-HSH	57	108-4724	1	Spring-Extension



## Trencher Assembly

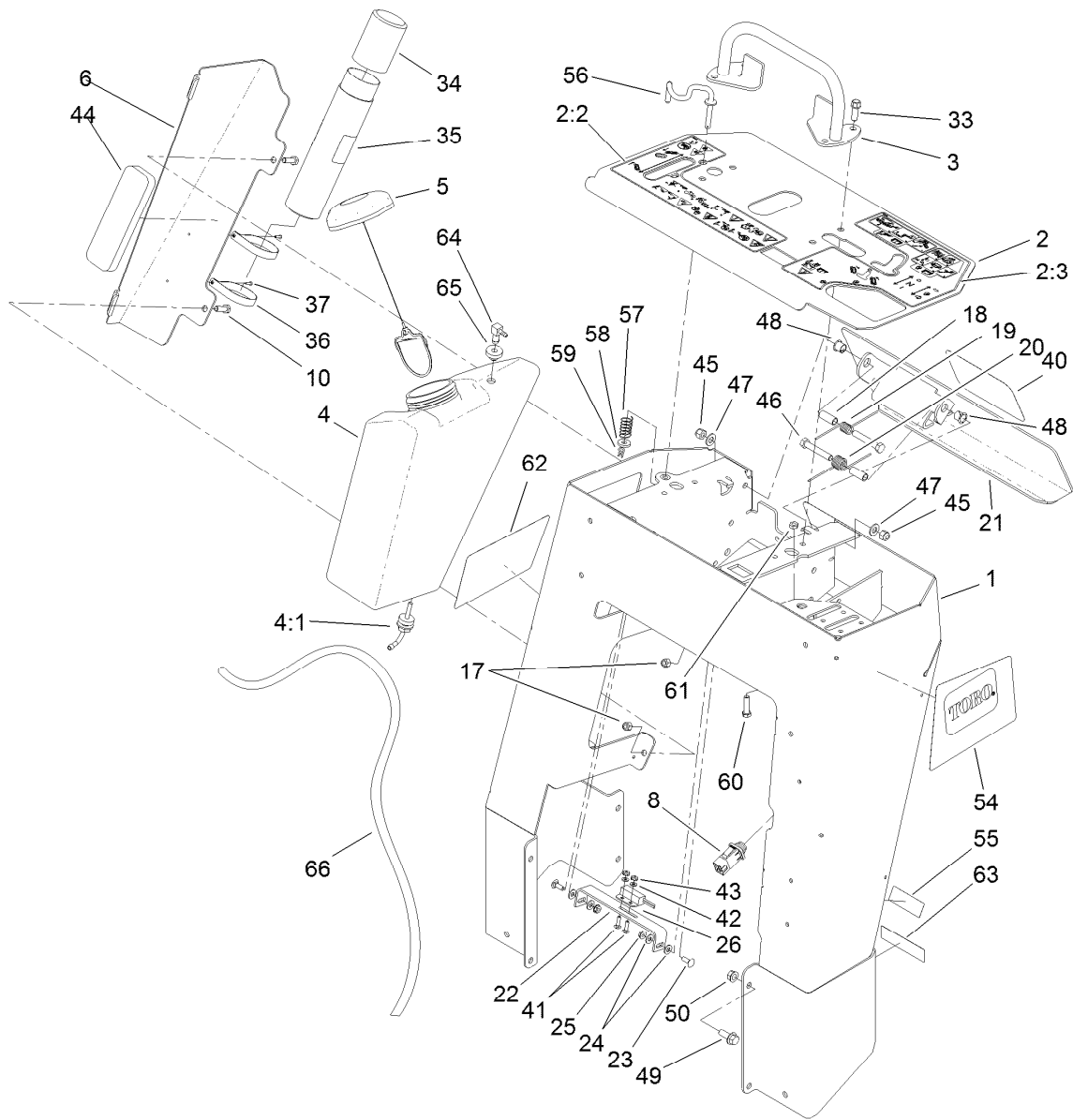
Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	114-8631	1	Trencher Head ASM	20	3296-23	1	Nut-Lock, NI
1:2	99-9952	2	Decal-Danger	21	321-18	1	Screw-HH
2	106-8871	1	Bearing-Ball	22	3296-42	1	Nut-Lock, NI
3	112-4979	1	Spacer	23	114-8569	1	Shield-Dirt
4	111199	1	Bearing-Ball	24	115-1220-03	1	Bar-Clamp
5	114-2955	1	Seal-Grease	29	115-1279-03	1	Bracket-Shield
6	112-4993	1	Shaft-Trencher	30	115-4049	2	Screw-HSH
7	131-0654	1	HYD Motor ASM	31	322-5	8	Screw-HH
8	114-2956	1	Lockwasher-Bearing	32	3256-3	4	Washer-Flat
9	88-1450	1	Locknut-Bearing	33	3296-29	11	Nut-Lock, NI
10	114-2954	1	Spline-Collar	34	121-4571	1	Spacer-Pivot
11	131-0661	2	Screw-HSH	35	117-6327	1	Bolt-HH
12	121-1955	1	HYD Cylinder ASM	36	3296-53	1	Nut-Lock, NI
13	120-7352	1	Pin-Pivot	37	322-23	1	Screw-HH
15	104-1964	1	Sprocket-Trencher	38	115-4001-03	1	Plate-Strap, Shield
16	302-5	3	Fitting-Grease	39	302-34	1	Fitting-Lube
17	3274-4	6	Screw-HSH	40	104-9216	2	Washer-Hardened
18	117-8852-03	1	Auger-Trencher	41	117-3479	2	Washer-Saddle
19	325-13	1	Screw-HH	44	131-0653-03	1	Plate-Spacer





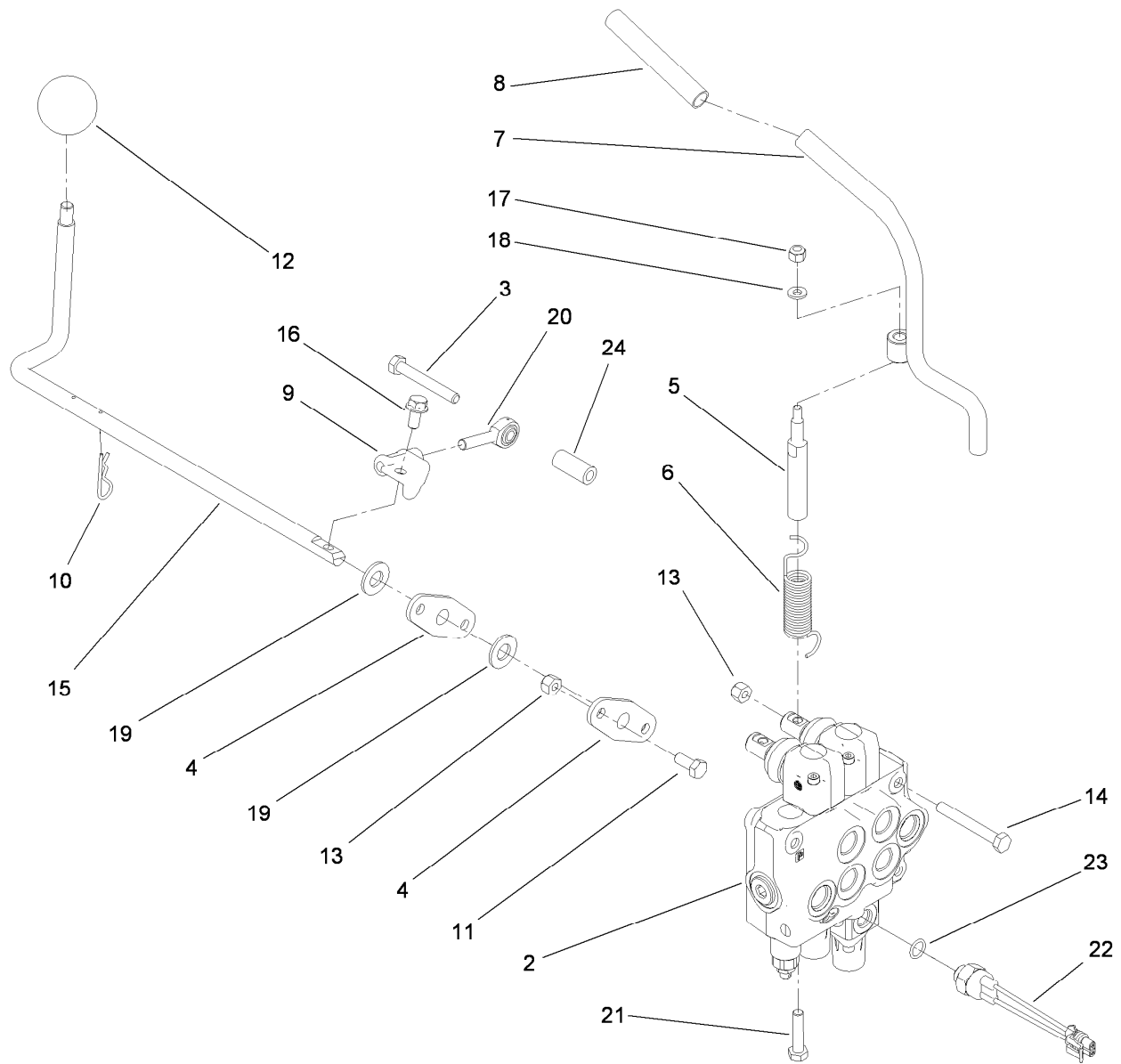
## Control Tower Assembly

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
1	117-6419-01	1	Tower	33	95-1726	4	Screw-Taptite
2	117-6389	1	Panel-Control	34	104-7048	1	Cap-Housing
2:2	115-1231	1	Decal-Console, RH	35	104-7050	1	Tube-Manual
2:3	115-1230	1	Decal-Console, LH	36	2412-120	2	Clamp-R
3	106-7715	1	Bar-Reference	37	3269-17	2	Rivet-Pop
4	120-7357	1	Tank-Fuel	40	105-1217	1	Decal
4:1	103-2605	1	Fitting-Fuel, Bulkhead	41	3229-20	2	Screw-CARR
5	120-5461	1	Cap-Fuel, Ratcheting	42	3256-51	2	Washer-Flat
6	114-3065-01	1	Bracket-Cover, Tank	43	32149-7	2	Nut-Keps
8	100-1268	1	Switch-Plunger	44	107-7507	1	Pad-Foam
10	322-5	2	Screw-HH	45	3296-39	2	Nut-Lock, NI
17	3296-29	2	Nut-Lock, NI	46	323-11	2	Screw-HH
18	114-1337	2	Spacer-Spring	47	3256-24	2	Washer-Flat
19	98-8425	1	Spring-Torsion, LH	48	256-257	2	Bushing-Nyliner
20	98-8424	1	Spring-Torsion, RH	49	3234-11	8	Screw-HHF
21	114-3012-03	1	Plate-Reverse	50	32128-40	8	Nut-Flange
22	100-1263	1	Plate-Switch	54	117-6282	1	Decal-Side, LH
23	3229-1	2	Bolt-CARR	55	120-7532	1	Decal-Info
24	3256-22	4	Washer-Flat	56	114-8727	1	Rod-Interlock
25	32149-2	2	Nut-Keps	57	85-6750	1	Spring-Control
26	100-1270	1	Switch-Proximity	58	88-7200	1	Washer-Flat



## Control Tower Assembly (continued)

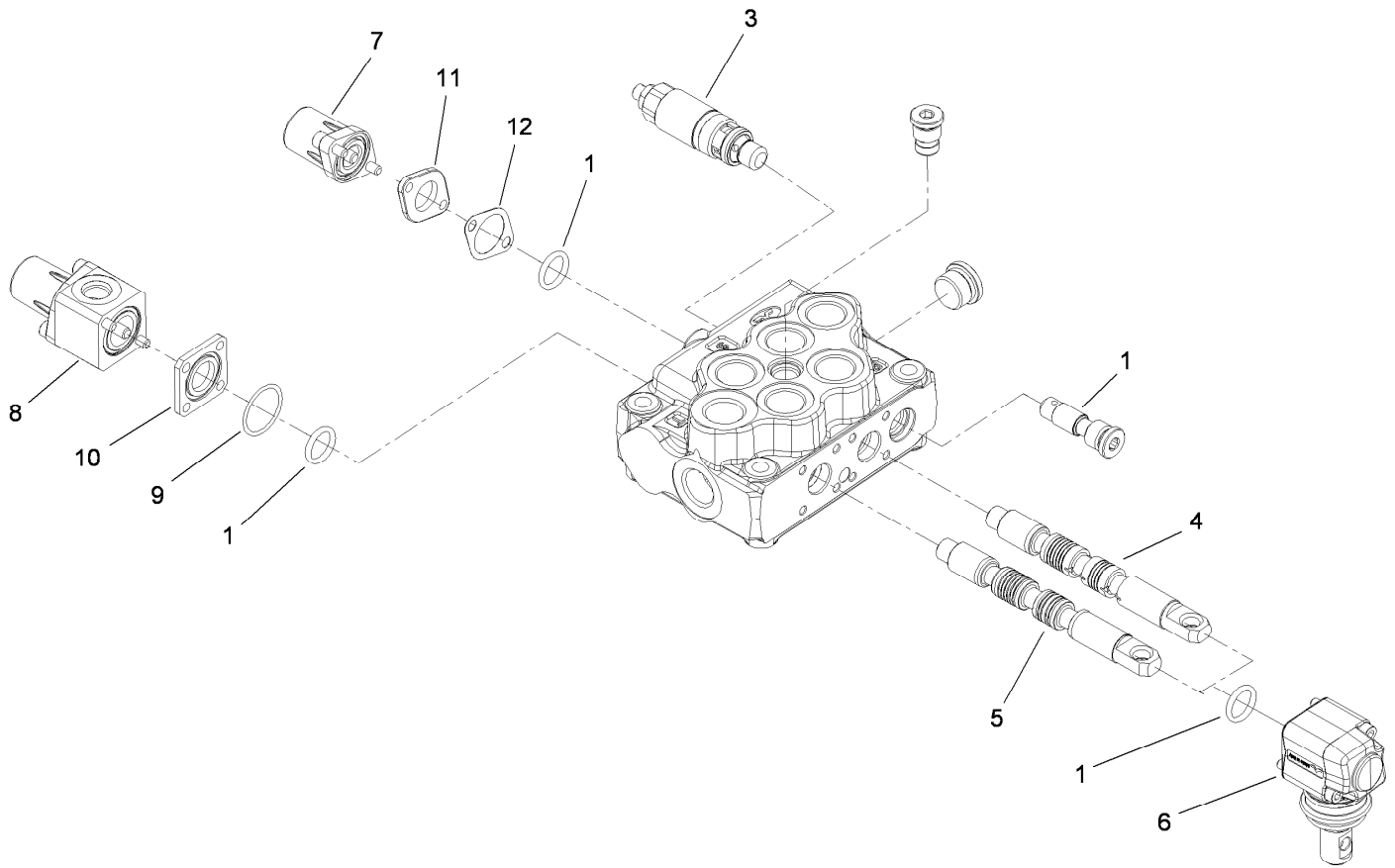
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
59	3290-307	1	Pin-Hair	63	117-2718	1	Decal-Arrester, Spark
60	3210-7	1	Screw-HH	64	104-5228	1	Fitting-Elbow, 90 DEG
61	3220-2	2	Nut-Jam	65	46-6560	1	Bushing
62	117-6271	1	Decal-Side, RH	66	117-6396	1	Hose-Vent, Tank



## Hydraulic Control Assembly

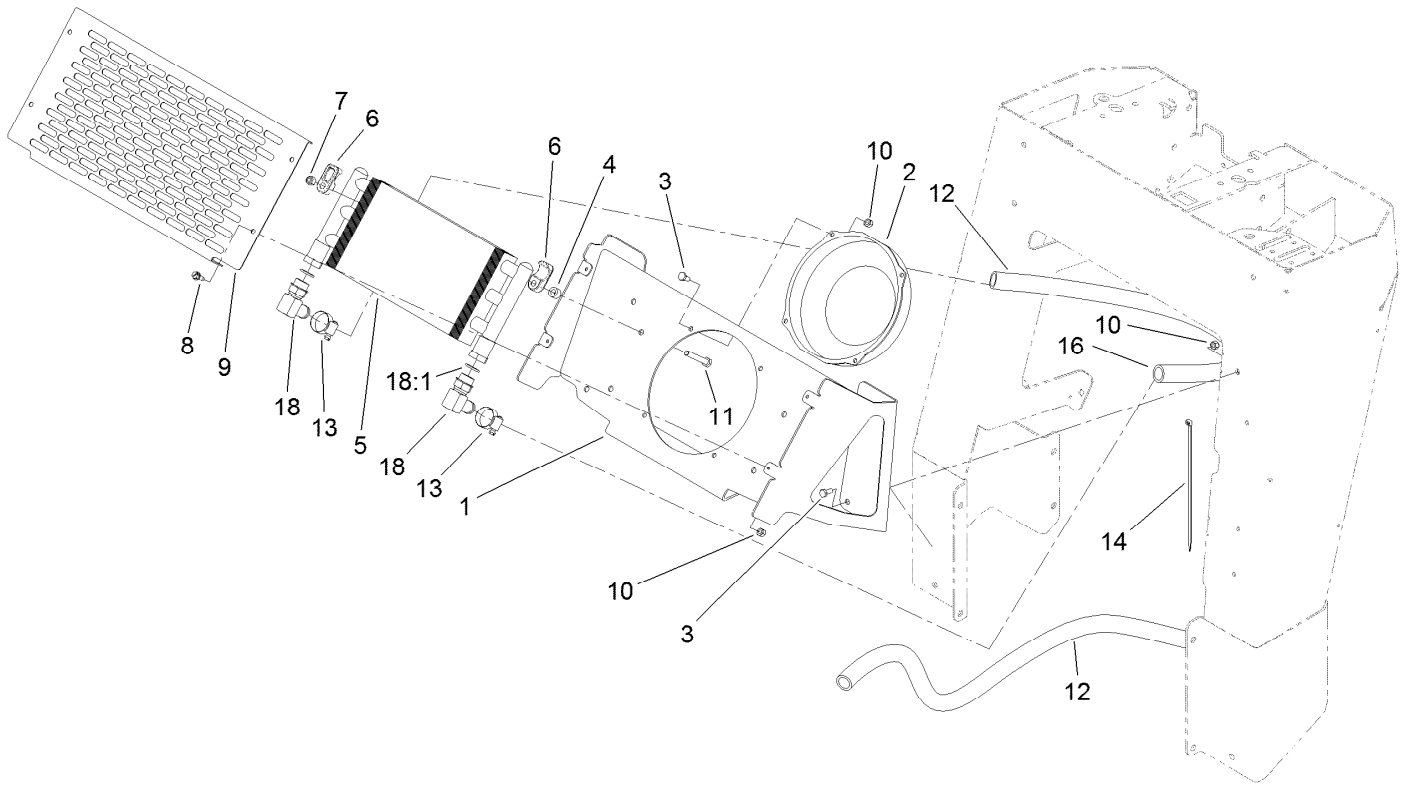
Ref.	Part Number	Qty.	Description
2	115-4062	1	HYD Valve ASM
3	33114-060	1	Screw-HH
4	20-1620	2	Bearing-Wheel, Friction
5	104-2827	1	Spacer-Hiflo
6	112-2738	1	Spring-Torsion
7	112-2739	1	Lever-Auxiliary
8	112-2605	1	Grip-Rubber
9	112-7210	1	Bracket-Control
10	3290-467	2	Pin-Hair
11	322-3	4	Screw-HH
12	233-21	1	Knob
13	3296-29	7	Nut-Lock, NI

Ref.	Part Number	Qty.	Description
14	322-12	3	Screw-HH
15	114-8598	1	Rod-Lever, Cylinder
16	3234-14	1	Screw-HHF
17	3296-42	1	Nut-Lock, NI
18	3256-16	1	Washer-Flat
19	3256-26	2	Washer-Flat
20	115-1273	1	Bearing-Rod End
21	48-7740	1	Screw
22	72-4310	1	Switch-Ball
23	237-42	1	O-Ring
24	103-0384	1	Spacer



## 2-Spool Valve Assembly No. 115-4062

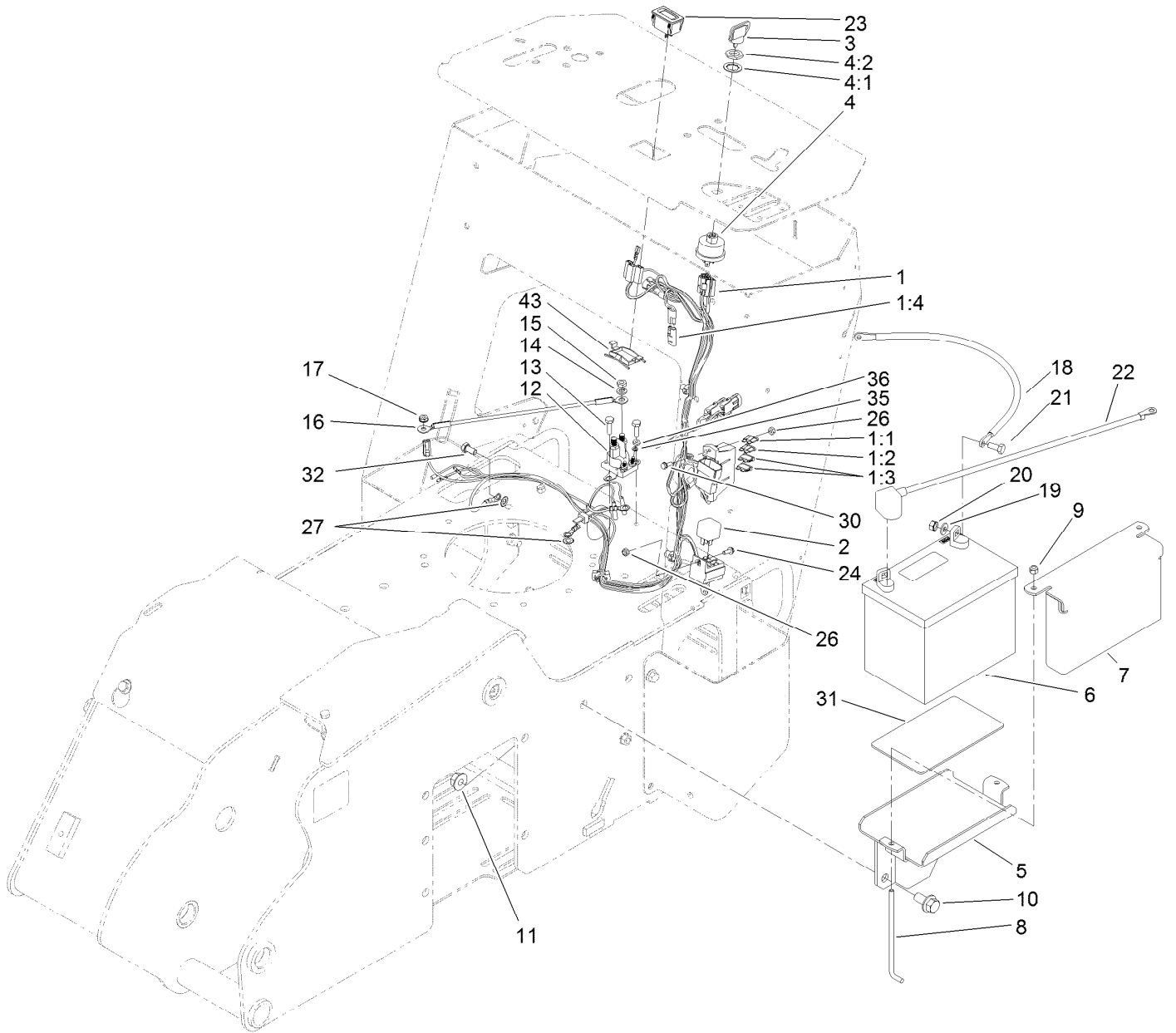
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
1	106-7719	4	Seal-Valve
3	100-8805	1	Valve-Relief
4	115-4084	1	Spool-Valve
5	106-7572	1	Spool
6	100-7229	2	Lever Kit
7	115-4092	1	Spring Return Kit
8	115-4093	1	Switch Spring Return Kit
9	115-4097	1	Seal-Return
10	115-4094	1	Spacer-Square
11	115-4089	1	Spacer-Spring Return
12	115-4088	1	Gasket-Return



## Oil Cooler Assembly

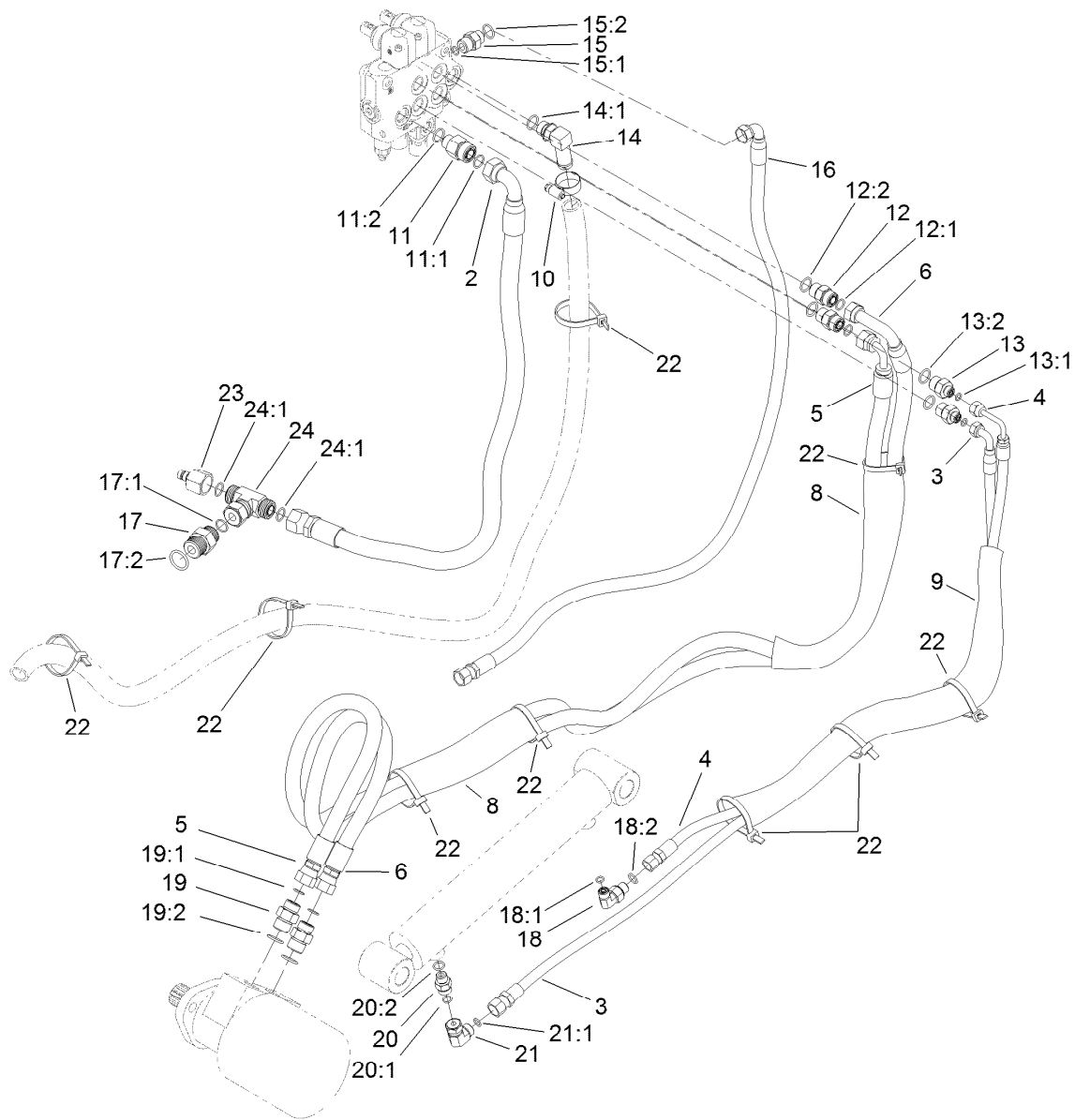
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
1	117-6296-01	1	Mount-Cooler	10	3296-42	12	Nut-Lock, NI
2	104-2809	1	Fan	11	322-11	4	Screw-HH
3	321-3	8	Screw-HH	12	115-1207	1	Hose-Return
4	98-4695	4	Spacer	13	2412-129	2	Clamp-Hose
5	105-0352	1	Exchanger-Heat	14	3334-945	1	Tie-Cable
6	105-3943	8	Clamp-Cooler, Oil	16	117-3966	1	Hose-Cooler
7	3296-29	4	Nut-Lock, NI	18	87-8170	2	Fitting
8	32104-95	4	Screw-HWH	18:1	237-80	1	O-Ring
9	119-4633-01	1	Cover-Cooler				

# Electrical Assembly



## Electrical Assembly (continued)

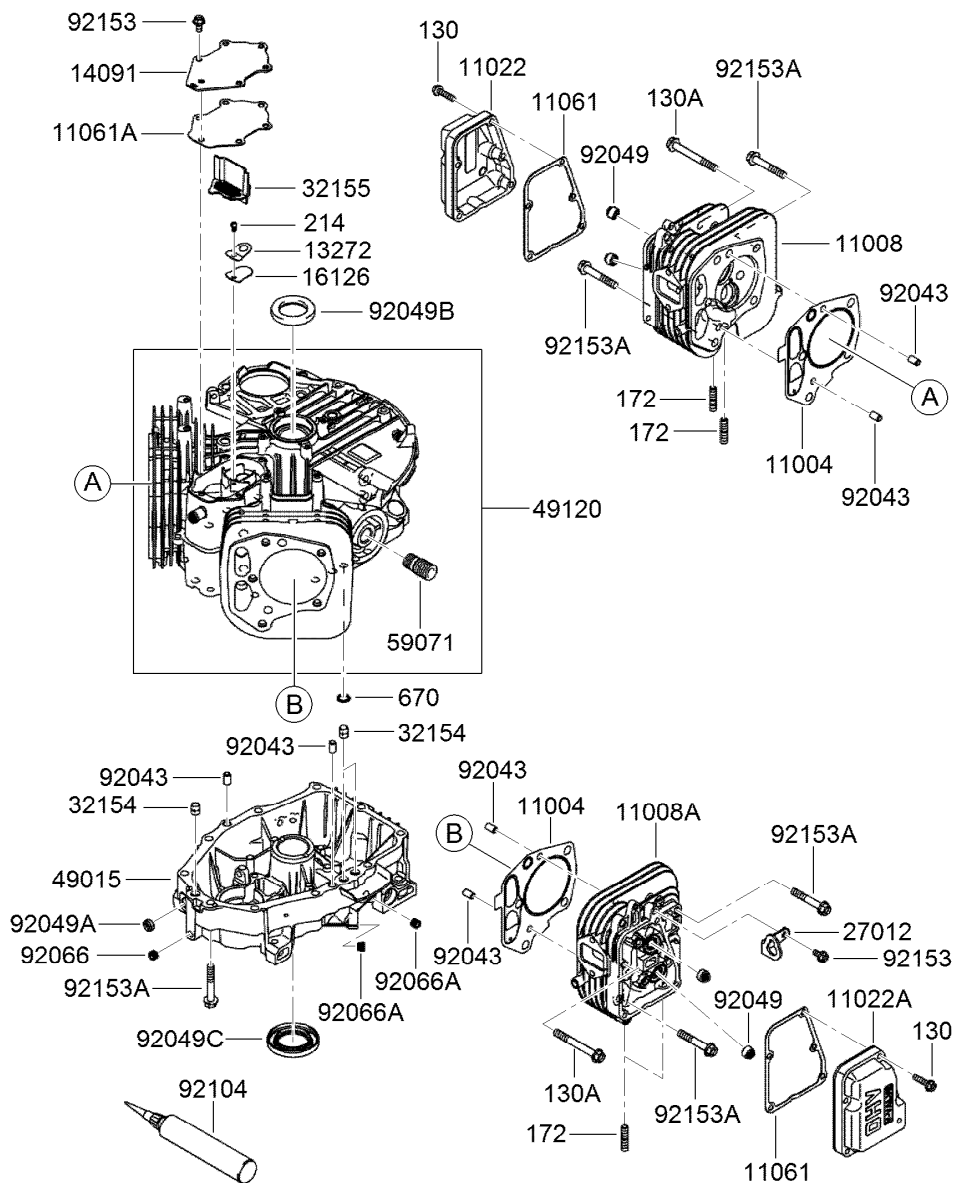
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>	<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
1	117-6289	1	Harness-Wire	14	3253-4	2	Washer-Lock
1:1	109103	1	Fuse-Blade, 30 Amp	15	3220-2	2	Nut-Jam
1:2	109102	1	Fuse-Blade, 25 Amp	16	28-3891	1	Wire-Solenoid/Starter
1:3	109355	2	Fuse-Blade, 15 Amp	17	32149-2	1	Nut-Keps
1:4	116-0053	1	Cap-Plug	18	112-9708	1	Cable-Battery, Red
2	98-7249	2	Relay	19	3256-2	2	Washer-Flat
3	63-8360	1	Key-Ignition	20	32149-1	2	Nut-Keps
4	88-9830	1	Key Switch ASM	21	322-3	2	Screw-HH
4:1	3254-5	1	Washer-Tooth, Internal	22	117-6422	1	Cable-Battery, Black
4:2	218-461	1	Nut-HH	23	120-2244	1	Hourmeter
5	105-3150-01	1	Tray-Battery	24	32105-23	1	Screw
6	104-8162	1	Battery-Dry	26	3296-2	2	Nut-Lock, NI
7	115-6621-03	1	Plate-Hold Down, Battery	27	3255-8	1	Washer-Lock
8	104-8567	2	Holdown-Battery	30	32105-13	1	Screw-HWH
9	3296-42	2	Nut-Lock, NI	31	62-4300	1	Pad-Skid, Anti
10	3234-6	2	Screw-HHF	32	33114-016	1	Screw-HH
11	32128-49	2	Nut-HHF	35	3253-17	2	Washer-Lock
12	117-1197	1	Solenoid	36	3219-14	2	Nut-Hex
13	321-4	2	Screw-HH	43	104-4234	1	Clip-Mounting



## Hydraulic Routing Assembly

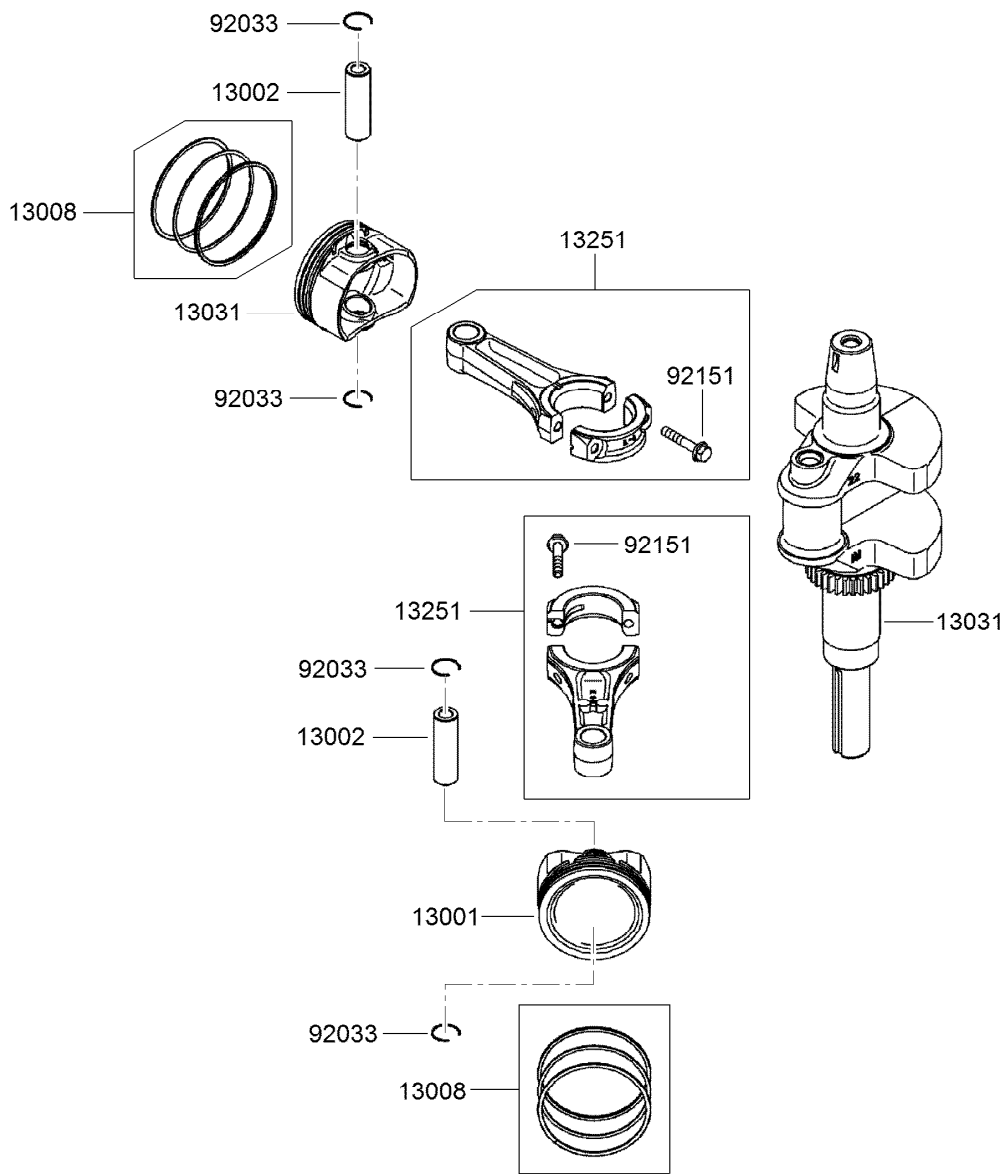
Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
2	114-3043	1	Hose-HYD	15:2	237-79	1	O-Ring
3	114-3044	1	Hose-HYD	16	117-4038	1	Hose ASM
4	114-3045	1	Hose-HYD	17	340-8	1	Adapter
5	114-3046	1	Hose-HYD	17:1	237-65	1	O-Ring
6	114-3085	1	Hose-HYD	17:2	237-81	1	O-Ring
8	99-5648	2	Sleeve-Protective	18	340-82	1	Adapter ASM
9	115-4064	1	Sleeve-Protective	18:1	237-42	1	O-Ring
10	2412-129	2	Clamp-Hose	18:2	237-21	1	O-Ring
11	340-155	1	Fitting-HYD, Straight	19	340-6	2	Fitting-HYD, Straight
11:1	237-79	1	O-Ring	19:1	237-30	1	O-Ring
11:2	237-151	1	O-Ring	19:2	237-80	1	O-Ring
12	340-4	2	Fitting-HYD, Straight	20	115-4081	1	Valve-Check
12:1	237-30	1	O-Ring	20:1	237-42	1	O-Ring
12:2	237-79	1	O-Ring	20:2	237-22	1	O-Ring
13	340-133	2	Adapter ASM	21	340-159	1	Fitting-HYD, 90 DEG
13:1	237-79	1	O-Ring	21:1	237-22	2	O-Ring
13:2	237-21	1	O-Ring	22	3334-945	9	Tie-Cable
14	353-954	1	Adapter	23	86-5860	1	Nipple
14:1	237-79	1	O-Ring	24	340-167	1	Fitting-HYD, Tee
15	340-3	1	Adapter	24:1	237-65	2	O-Ring
15:1	237-22	1	O-Ring				





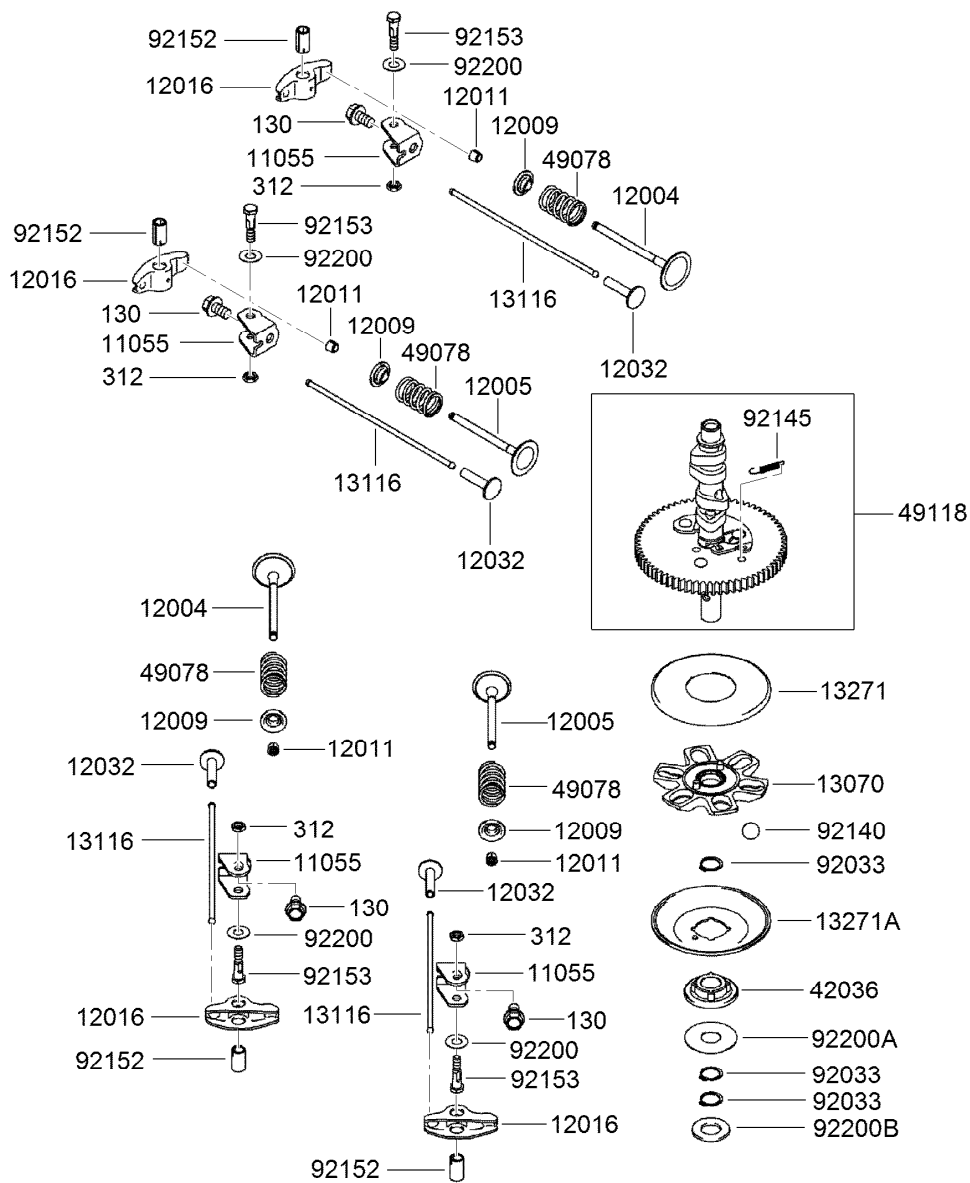
## Cylinder and Crankcase Assembly

Ref.	Part Number	Qty.	Description	Ref.	Part Number	Qty.	Description
130	93-8548	10	Bolt-Flanged (6X25)	32154	119-5811	3	Pipe
130A	120-7406	6	Bolt-Flanged (8X70)	32155	119-5812	1	Pipe-Breather
172	114-8658	4	Bolt-Stud (8X18)	49015	120-7481	1	Cover-Crankcase
214	115-6422	1	Screw-Pan (4X8)	49120	120-7482	1	Crankcase ASM
670	95-9771	2	O-Ring (11Mm)	59071	95-9715	1	Joint
11004	120-7400	2	Gasket-Head	92043	KW10694	6	Pin
11008	120-7478	1	Cylinder Head No.1 ASM	92049	114-8650	4	Seal-Oil, Rv C2 (6X11X10.2)
11008A	120-7479	1	Cylinder Head No.2 ASM	92049A	119-5816	1	Seal-Oil, So (8X14X5) Hs
11022	119-5803	1	Case-Rocker (No.1)	92049B	119-5817	1	Seal-Oil, Sd (35X48X8) R Hs
11022A	119-5804	1	Case-Rocker (No.2)	92049C	119-5818	1	Seal-Oil (38X62X8) Mtclv
11061	119-5805	2	Gasket-Case, Rocker	92066	119-5819	1	Plug
11061A	119-5806	1	Gasket-Breather	92066A	119-5820	2	Plug
13272	119-5808	1	Plate-Breather	92104	119-5821	1	Gasket-Liquid (Tb1217H)
14091	119-5809	1	Cover-Breather	92153	114-8655	7	Bolt (6X12)
16126	119-5810	1	Valve-Breather	92153A	114-8656	14	Bolt (8X50)
27012	120-7480	1	Hook-Lift				



## Piston and Crankshaft Assembly

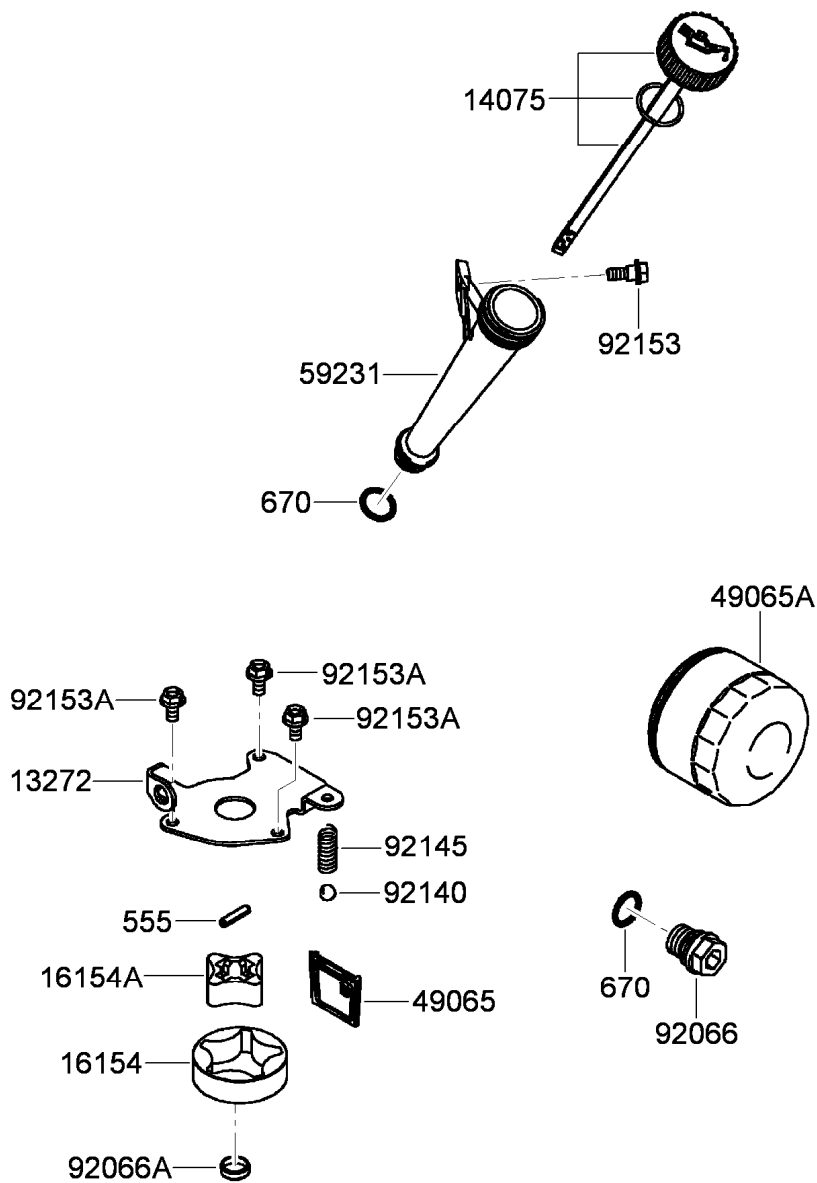
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
13001	120-7483	2	Piston-Engine
13002	108-2517	2	Pin-Piston
13008	120-7484	2	Piston Ring Set
13031	120-7485	1	Crankshaft ASM
13251	120-7412	2	Connecting Rod ASM
92033	114-8665	4	Ring-Snap
92151	115-6565	4	Bolt (6X35)



## Valve and Camshaft Assembly

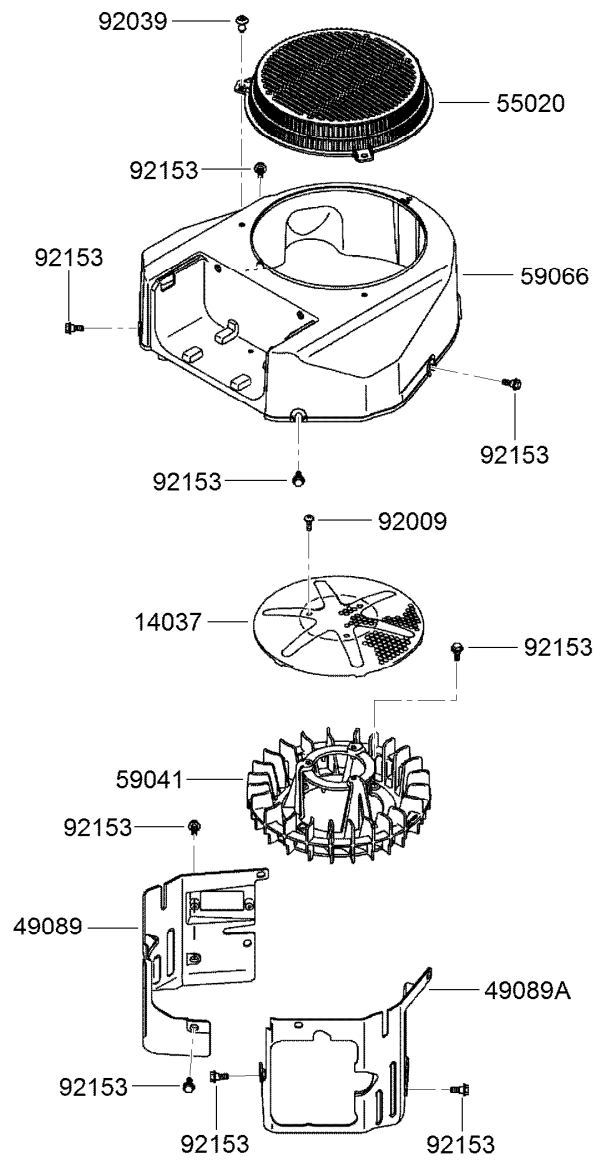
Ref.	Part Number	Qty.	Description
130	119-5845	4	Bolt-Flanged (8X14)
312	119-5846	4	Nut-Hex (6Mm)
11055	119-5832	4	Bracket
12004	120-7413	2	Valve-Intake
12005	120-7414	2	Valve-Exhaust
12009	108-2525	4	Retainer-Spring, Valve
12011	95-9744	8	Collet
12016	119-5835	4	Arm-Rocker
12032	108-2527	4	Tappet
13070	119-5836	1	Guide-Governor
13116	120-7415	4	Rod-Push
13271	114-8671	1	Plate

Ref.	Part Number	Qty.	Description
13271A	114-8672	1	Plate-Governor
42036	114-8673	1	Sleeve
49078	119-5838	4	Spring-Valve, Engine (In)
49118	120-7417	1	Camshaft ASM
92033	114-8675	3	Ring-Snap
92140	114-8676	6	Ball
92145	114-8677	1	Spring
92152	119-5840	4	Collar
92153	119-5841	4	Bolt (6X29.5)
92200	119-5842	4	Washer (8.1X18X0.5)
92200A	119-5843	1	Washer (16X42X0.91)
92200B	119-5844	1	Washer (16.3X30X2.28)



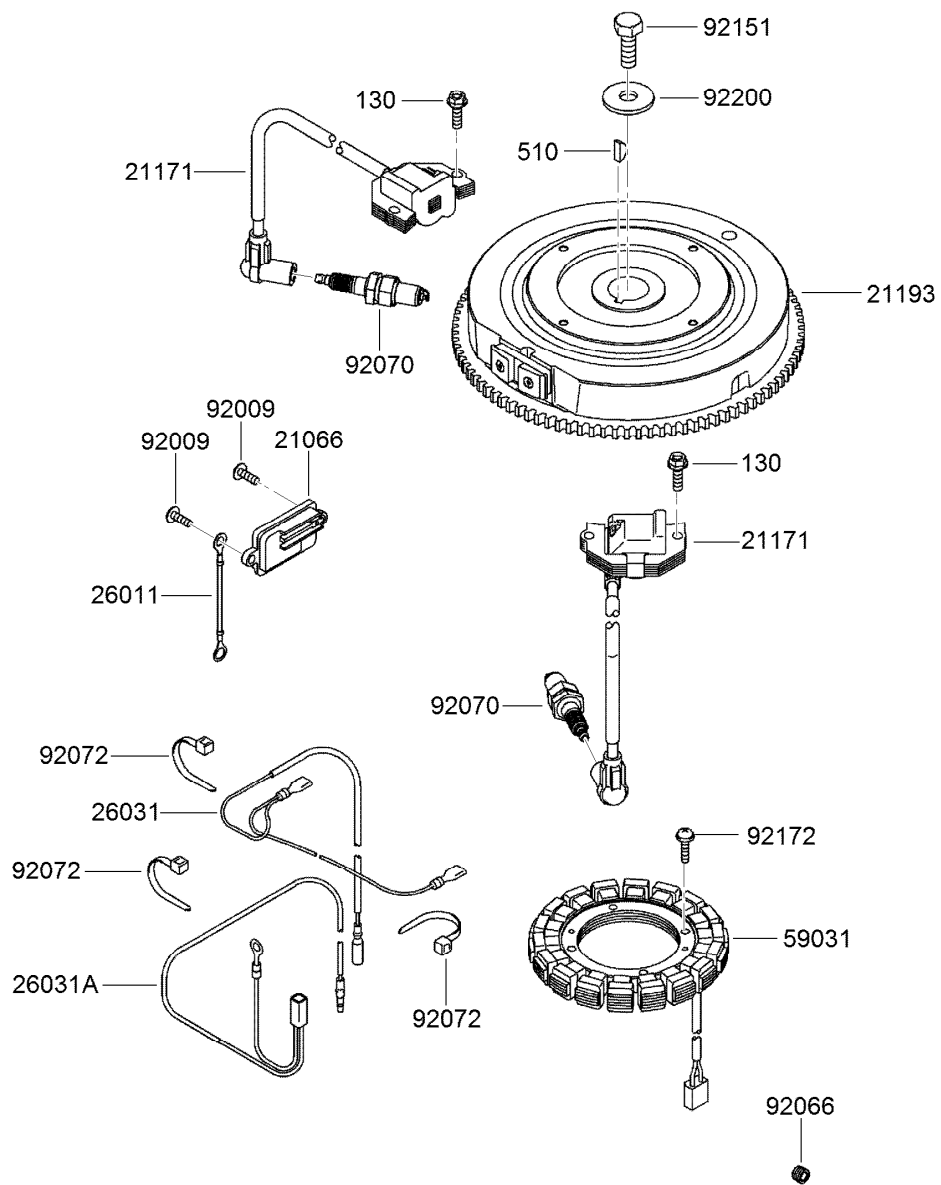
## Lubrication Equipment Assembly

Ref.	Part Number	Qty.	Description
555	119-5859	1	Pin-Spring (4X20)
670	1-413506	2	Discontinued
13272	119-5847	1	Plate-Rotor
14075	119-5848	1	Oil Gauge Cap ASM
16154	119-5849	1	Rotor-Pump, Outer
16154A	119-5850	1	Rotor-Pump, Inner
49065	119-5851	1	Filter-Oil
49065A	119-5852	1	Filter-Oil
59231	119-5853	1	Tube-Filler, Oil
92066	119-5854	1	Plug
92066A	119-5855	1	Plug
92140	119-5856	1	Ball
92145	119-5857	1	Spring
92153	114-8697	1	Bolt
92153A	115-6419	3	Bolt (6X12)



## Cooling Equipment Assembly

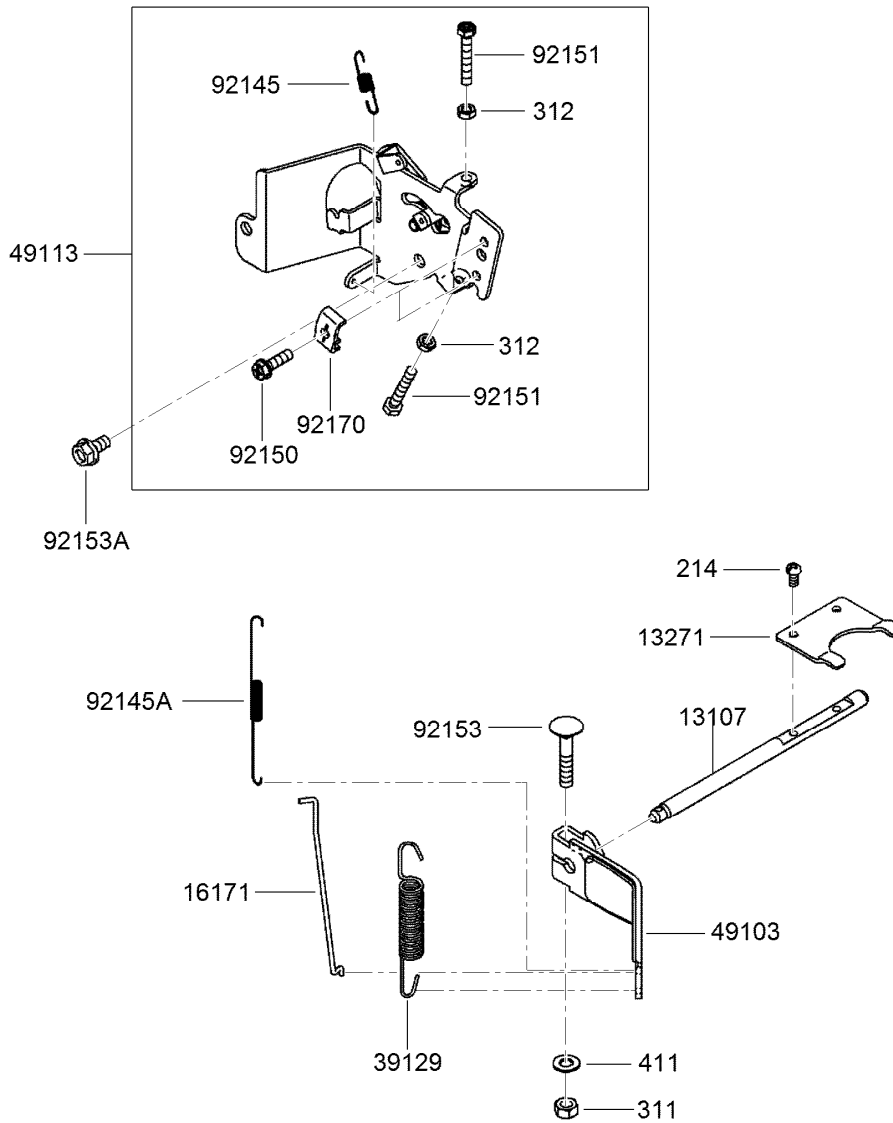
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
14037	120-7486	1	Screen
49089	120-7420	1	Shroud-Engine
49089A	120-7421	1	Shroud-Engine
55020	120-7487	1	Guard-Screen
59041	120-7488	1	Fan
59066	120-7489	1	Housing-Fan
92009	119-5879	3	Screw
92039	120-7490	3	Rivet-Guard
92153	120-7424	12	Bolt



## Electric Equipment Assembly

Ref.	Part Number	Qty.	Description
130	95-9893	4	Bolt-Flanged (6X20)
510	KW10163	1	Key-Woodruff
21066	120-7356	1	Regulator-Voltage
21171	119-5872	2	Ignition Coil ASM
21193	120-7491	1	Flywheel ASM
26011	120-7492	1	Wire-Lead (L=95)
26031	119-5876	1	Harness
26031A	120-7493	1	Harness

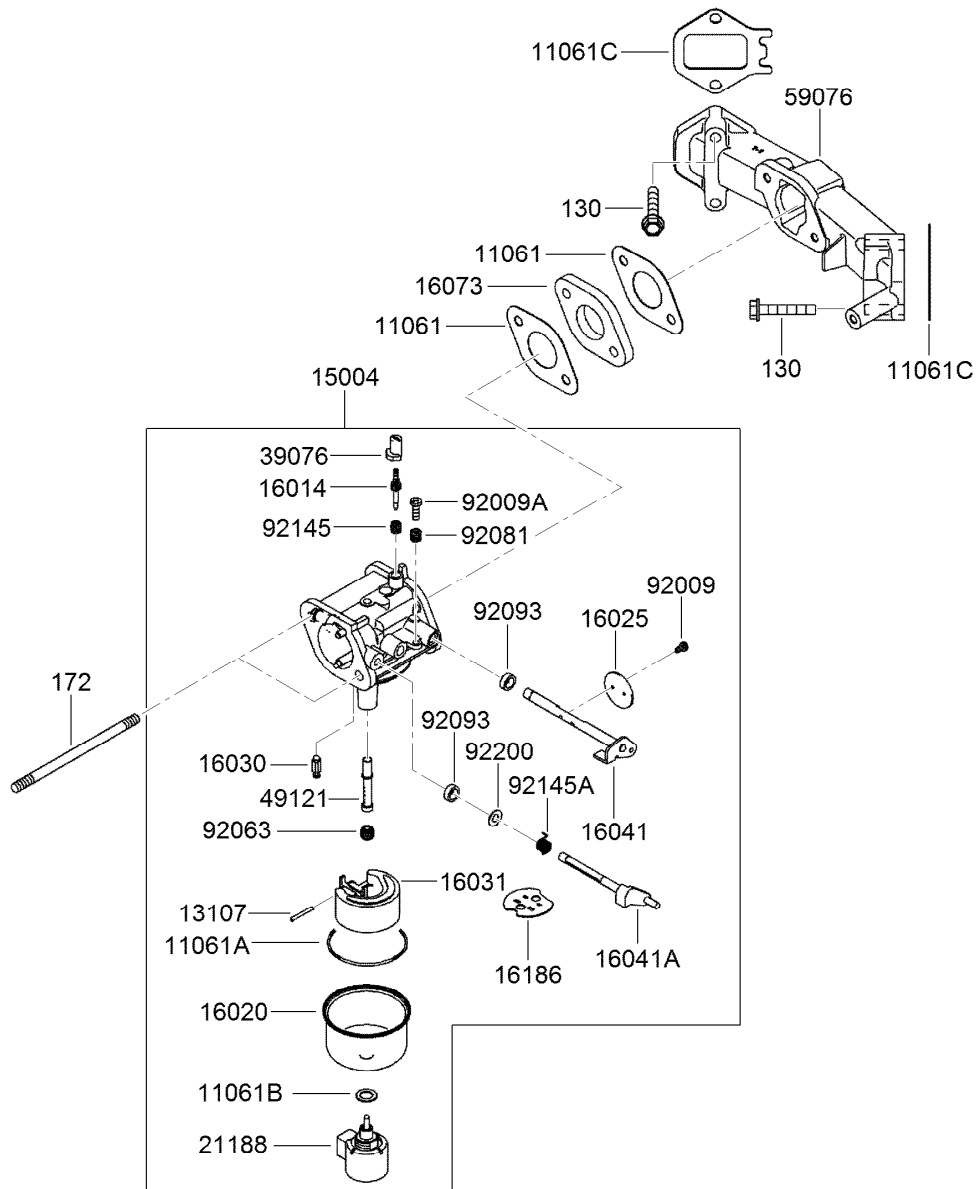
Ref.	Part Number	Qty.	Description
59031	120-7494	1	Coil-Charging
92009	119-5879	2	Screw
92066	119-5820	1	Plug
92070	92-2153	2	Spark Plug
92072	115-6585	3	Band
92151	115-6408	1	Bolt (12X30)
92172	115-4030	4	Screw (5X20)
92200	115-4031	1	Washer (12.2X46X3)



## Control Equipment Assembly

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
214	115-6422	2	Screw-Pan (4X8)
311	114-8698	1	Nut-Hex (6Mm)
312	119-5894	2	Nut-Hex (5Mm)
411	115-6423	1	Washer-Plain (6Mm)
13107	120-7428	1	Shaft
13271	119-5883	1	Plate
16171	120-7495	1	Link
39129	120-7496	1	Spring-Governor
49103	120-7431	1	Arm-Governor

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
49113	120-7497	1	Control Panel ASM
92145	120-7498	1	Spring
92145A	119-5889	1	Spring
92150	95-9853	2	Bolt (5X18)
92151	119-5891	2	Bolt (5X30)
92153	115-6420	1	Bolt (6X35)
92153A	114-8655	1	Bolt (6X12)
92170	115-6421	2	Clamp

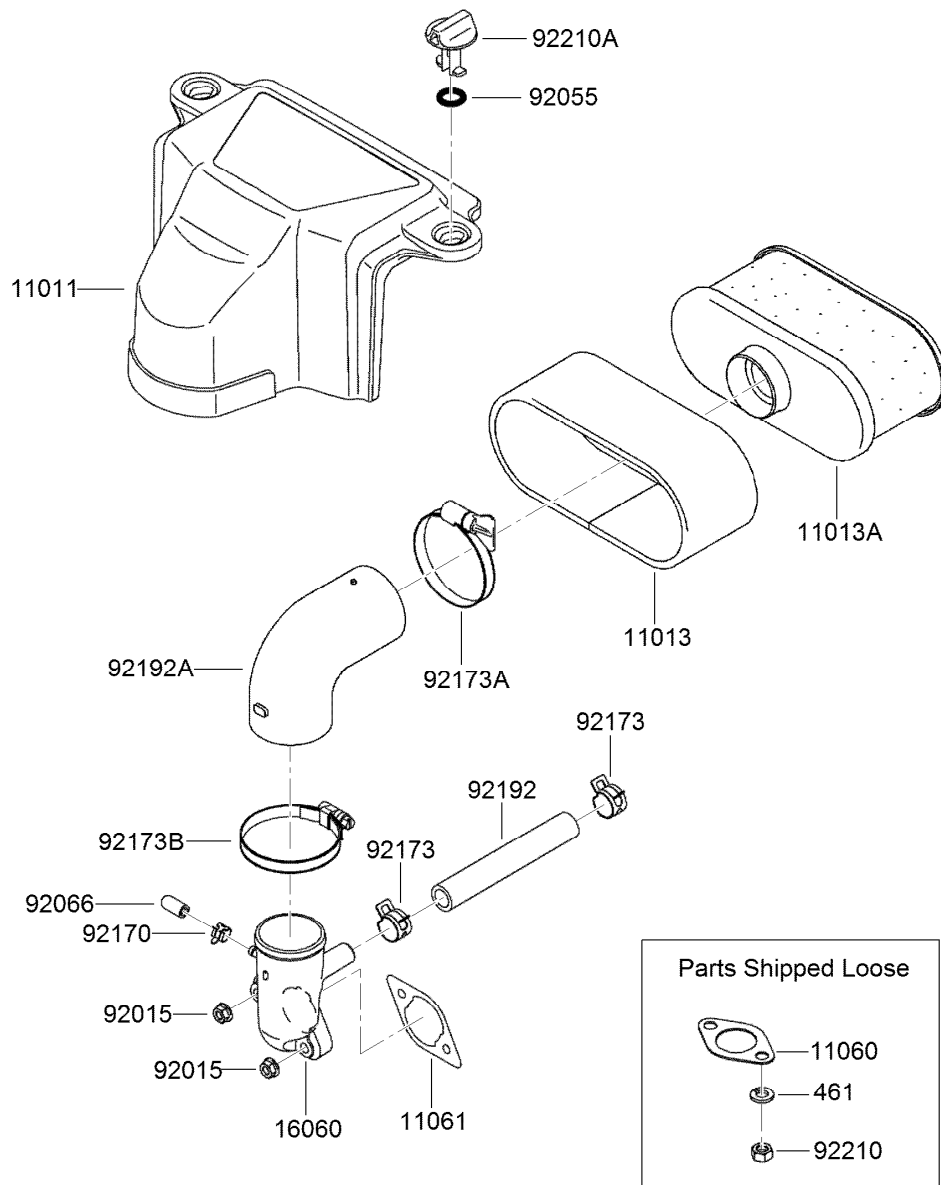


## Carburetor Assembly

Ref.	Part Number	Qty.	Description
130	115-6591	4	Bolt-Flanged (6X35)
172	120-7446	2	Bolt-Stud (6X95)
11061	115-6424	2	Gasket-Insulator
11061A	115-6425	1	Gasket-Chamber
11061B	108-2580	1	Gasket-Screw
11061C	120-7433	2	Gasket-Manifold
13107	115-6427	1	Shaft
15004	120-7499	1	Carburetor ASM
16014	120-7436	1	Screw-Air, Pilot
16020	115-6430	1	Chamber-Float
16025	115-6431	2	Valve-Throttle
16030	115-6432	1	Valve-Float
16031	115-6433	1	Float
16041	115-6435	1	Shaft-Throttle, Carburetor
16041A	120-7437	1	Shaft-Carburetor, Choke

Ref.	Part Number	Qty.	Description
16073	115-6594	1	Insulator
16186	120-7438	1	Choke Valve ASM
21188	115-6597	1	Solenoid
39076	108-2593	1	Limiter
49121	120-7500	1	Nozzle-Main
59076	120-7440	1	Manifold-Intake
92009	108-2595	2	Screw
92009A	108-2596	1	Screw
92063	120-7443	1	Jet-Main, No. 102
92081	108-2598	1	Spring
92093	108-2599	2	Seal
92145	108-2600	1	Spring
92145A	120-7444	1	Spring
92200	120-7445	1	Washer (9.8X5.5X1.0)

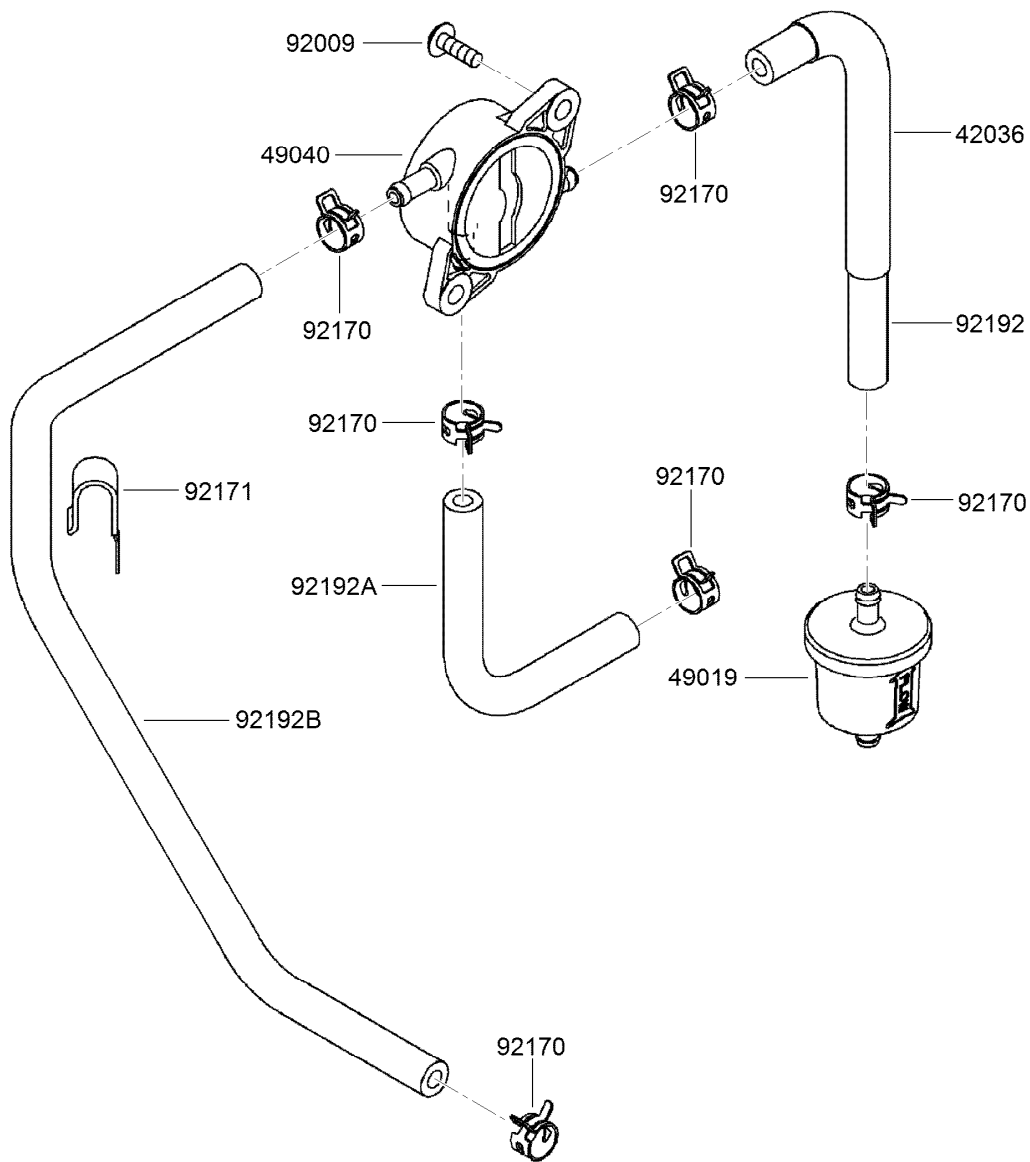




## Air Filter and Muffler Assembly

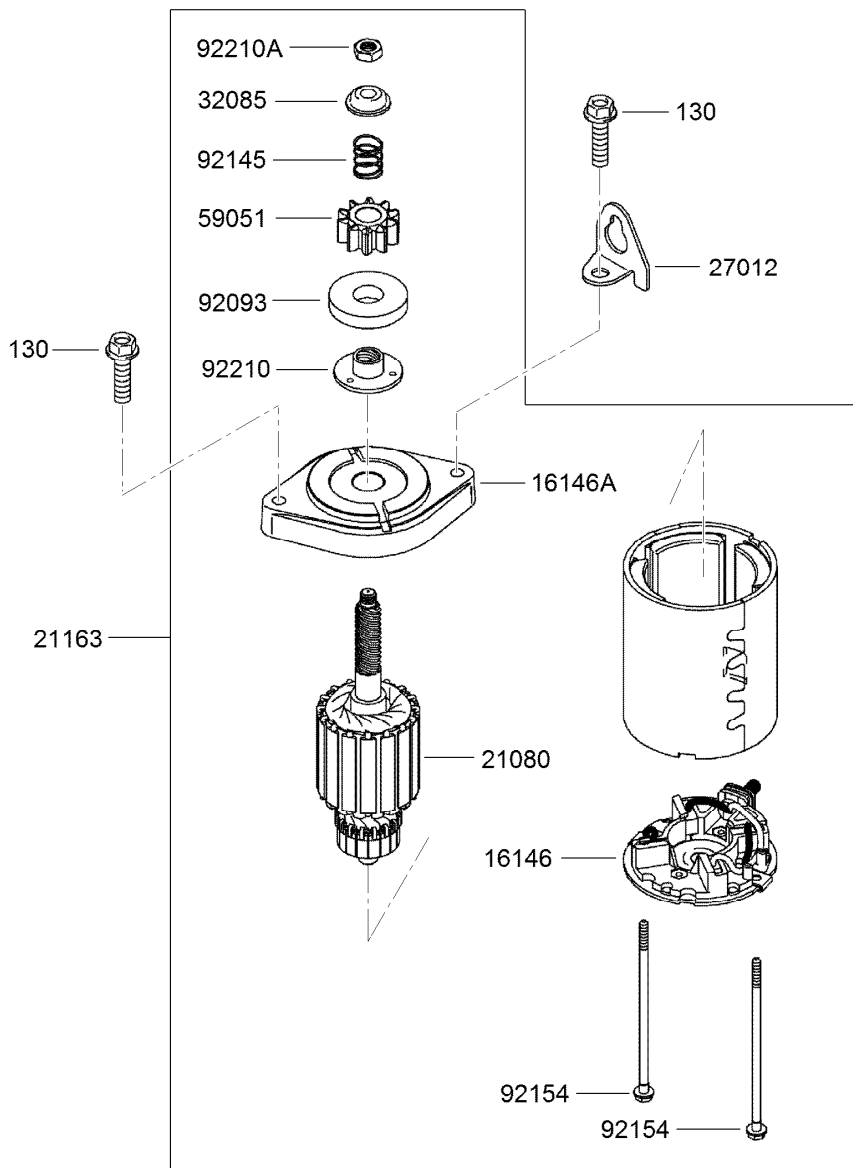
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
461	119-5962	4	Washer-Spring (8Mm)
11011	120-7477	1	Case-Filter, Air
11013	120-7501	1	Element-Filter, Air
11013A	120-7502	1	Element-Filter, Air
11060	119-5948	2	Gasket-Muffler
11061	115-6426	1	Gasket-Cleaner, Air
16060	120-7450	1	Pipe-Intake
92015	119-5954	2	Nut
92055	120-7451	2	O-Ring

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
92066	120-7452	1	Plug
92170	120-7453	1	Clamp
92173	119-5956	2	Clamp
92173A	120-7454	1	Clamp
92173B	120-7455	1	Clamp
92192	119-5957	1	Tube (12.6X18.6X118)
92192A	120-7503	1	Tube-A/C
92210	119-5959	4	Nut (M8)
92210A	120-7457	2	Nut



## Fuel Pump and Filter Assembly

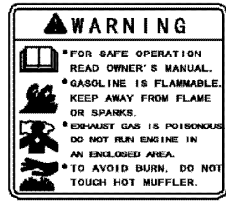
<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
42036	119-5963	1	Sleeve
49019	121-4570	1	Filter-Fuel
49040	119-5965	1	Pump-Fuel
92009	119-5879	2	Screw
92170	119-5967	6	Clamp
92171	119-5968	1	Clamp
92192	119-5969	1	Tube (6.35X12.7X185)
92192A	119-5970	1	Tube (6.4X12.7X150)
92192B	120-7516	1	Tube (6.35X12.7X360)



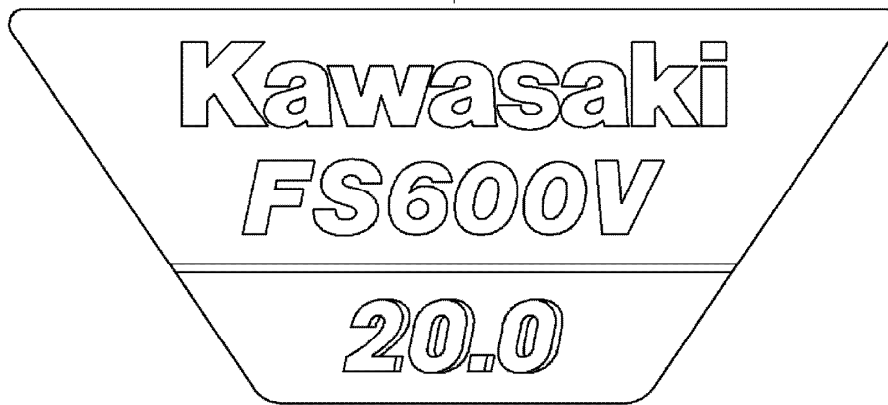
## Starter Assembly

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
130	120-7515	2	Bolt-Flanged (8X30)
16146	120-7504	1	Cover ASM
16146A	120-7505	1	Cover ASM
21080	120-7506	1	Armature
21163	120-7507	1	Electric Starter ASM
27012	119-5983	1	Hook
32085	120-7508	1	Stopper
59051	120-7509	1	Gear-Spur
92093	120-7510	1	Seal
92145	120-7511	1	Spring
92154	120-7512	2	Bolt
92210	120-7513	1	Nut
92210A	120-7514	1	Nut

56070



56080



## Label Set

<i>Ref.</i>	<i>Part Number</i>	<i>Qty.</i>	<i>Description</i>
56070	108-2625	1	Label-Warning
56080	120-7517	1	Label-Brand

# Attachments and Accessories

## For 22973 TRX-20 Trencher

<b>Product Name</b>	<b>Model/Part</b>
8in Chain Conversion Kit for 36in Soil Chain .....	117-3480
Crumber Kit .....	22477
24in X 4in Soil Chain .....	22480
24in X 4in Combination Chain .....	22481
24in X 4in Rock Tooth Chain .....	22482
24in X 6in Soil Chain .....	22483
24in X 6in Combination Chain .....	22484
24in X 6in Rock Tooth Chain .....	22485
36in X 4in Soil Chain .....	22486
36in X 4in Combination Chain .....	22487
36in X 4in Rock Tooth Chain .....	22488
36in X 6in Rock Tooth Chain .....	22489
36in X 6in Soil Chain .....	22490
36in X 6in Combination Chain .....	22491
48in x 4in Soil Chain .....	22492
48in x 4in Combination Chain .....	22493
48in x 6in Soil Chain .....	22494
48in x 6in Combination Chain .....	22495
24in X 4in Bullet Chain .....	22496
24in X 6in Bullet Chain .....	22497
36in X 4in Bullet Chain .....	22498
36in X 6in Bullet Chain .....	22499
24in Trencher Boom .....	22975
36in Trencher Boom .....	22976
48in Trencher Boom .....	22977
Bore Drive Attachment .....	22978
Backfill Blade .....	22980
Spark Arrestor Screen .....	94-8157

**Notes:**

**Notes:**



**Count on it.**