

Parts Catalog

Armadillo 10X Series

Models: Gasoline, LP & Diesel



PREFACE

Thank you for your purchase of the industry standard for industrial equipment. PowerBoss takes great pride in offering the most dependable, reliable and best value in industrial equipment; we set the standard.

Our publishing department would like to hear from you. If you see any errors, omissions or something that needs clarification in this spare parts catalog please let us know. We are working hard toward perfection in our corner of the process to bring you the best you can buy. Please copy the form below, fill out and comment on how you found our catalog.

Thank you.

Name _____

Title: _____

Company Name: _____

Address: _____

Country: _____

Type of equipment or model number: _____

Comments:

Please return to:

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This is the spare parts catalog for the PowerBoss Armadillo 10X Sweeper.

This catalog covers all standard Armadillo 10X machine variations beginning January 2013.

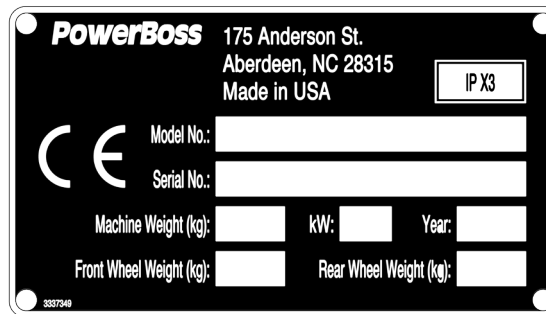
We believe this machine will provide excellent service for many years, however, the best results will be obtained if:

- The machine is operated with reasonable care.
- The machine is maintained regularly per the maintenance schedule provided in the user manual.
- The machine is maintained with PowerBoss Inc. supplied or equivalent parts.

All right side and left side references to the machine (except for engine) are determined by facing the direction of forward travel. The front of the engine or engine fan faces the rear of the machine. Some hardware considered to be common or locally available has been omitted from the parts section to make this manual clear. Be sure to use equivalent hardware when replacement becomes necessary.

The model and serial number of your machine is shown on the I.D. name plate. This information is needed when contacting technical support or when ordering parts. The I.D. plate is mounted on the console of the machine to the left of the operator, adjacent to the main broom adjustment access door.

Example I.D Plate:



Parts may be ordered by phone, fax or e-mail from any PowerBoss parts and service center. Before ordering parts or supplies, be sure to have your machine model number and serial number handy. For your convenience fill out the data block below for future reference.

MACHINE DATA	
Fill Out at Installation	
Serial Number:	_____
Engine Serial Number:	_____
Sales Rep.:	_____
Date of Install:	_____

All information contained in this catalog is current at the time of printing, however, PowerBoss reserves the right to make changes at any time without notice.

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The following describes how to read this spare parts catalog. The item column corresponds to the accompanying drawing. The part no. column displays the PowerBoss part number for the called out part. This column can be divided for different machines and/or models. The req'd column is the number of parts for the drawing on that page and the description is PowerBoss's description for that part number.

NOTE: Where N/A is indicated as the part number the item is not applicable to that particular model.

NOTE: Part numbers that span more than one column apply to the models listed in the heading of the column.

NOTE: --XXX-- listed under a column are parts that must be bought as part of an assembly or are not available separately. Blank under a column means there is no number used in the view. Dash items are not called out in views, but are available.

EXAMPLE TABLE					
ITEM	PART NO.			REQ'D	DESCRIPTION
	GAS	LP	DSL		
1	711427	N/A	711427	2	NUT-FLANGED WIZZ 10-32
2	3300388	N/A	3300388	1	SENDER - FUEL W/ CORK GASKET
3	--XXX--	N/A	--XXX--	1	NOT SOLD SEPARATELY
4	3335055	N/A	3307575	1	ARMA - FUEL TANK
5	3337019	N/A	3337019	1	SEAL - #10 BONDED NITRILE WASHER
6	3400498	N/A	3400498	1	FTG-NIPPLE 1/4 MPT
7	3400499	N/A	3400499	1	VALVE-MINATURE 1/4 FPT BALL
8	3400793	N/A	3400793	1	FTG-90 DEG 3/8 BARB TO 1/4 NPT
9	3401579	N/A	3401579	1	SCR - HEX STANDOFF, 2X 10-32X.50 LG
10	3401579	N/A	3401636	4	SCR - PAN, 10-32 X .50, BUNA O-RING SS
11	3402022	N/A	3402022	1	FTG-90 1/4 MPT X 1/4 HOSE BARB
-	3335272	N/A	3307066	1	FUEL TANK SUB (INCLUDES 1-11)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS					

TECHNICAL SPECIFICATIONS

Model Armadillo 10X
 Model No. 10XT3DSL / 10XT3LP / 10XT3GAS

DIMENSIONS & WEIGHT

Length 105 inch (266.7 cm)
 Width 68 inch (172.7 cm)
 Height 55.38 inch (
 W/ overhead guard 81 inch (205.7 cm)
 W/ cab 81 inch (205.7 cm)
 Weight 4,575 lbs. (2,075 kg)
 Minimum U-turn. 115 inch (292 cm)

SWEEPING SYSTEM

Productivity 217,800 ft²/hr (20,234 m²/hr)
 Sweep path..... 74 inch (187.9 cm)
 Main broom 56 inch (142 cm)
 Side broom..... 26 inch (66 cm)
 Left side broom (optional). 86 inch (218.4 cm)
 Hopper type..... RTR high dump
 Hopper volume..... 30 cu. ft.
 Hopper load capacity 2,000 lbs (907 kg)
 Dust control 180 ft² (16.7 m²)
 High dump 64 inch (162.6 cm)
 RTR (rotary trash relocation) yes

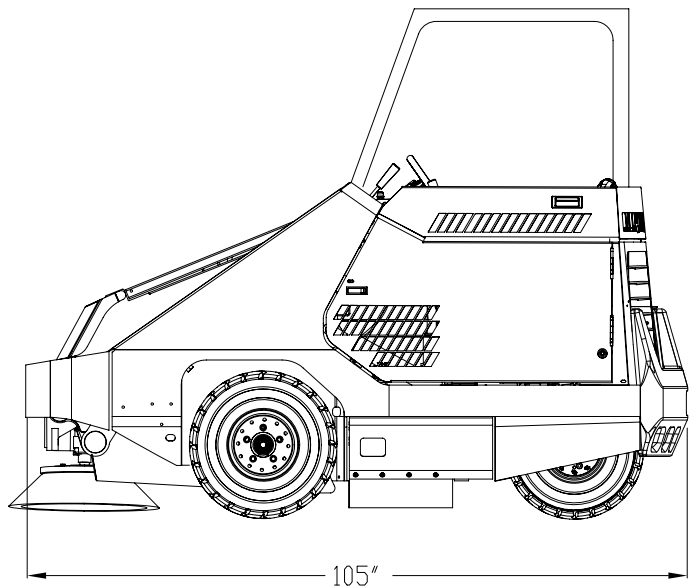
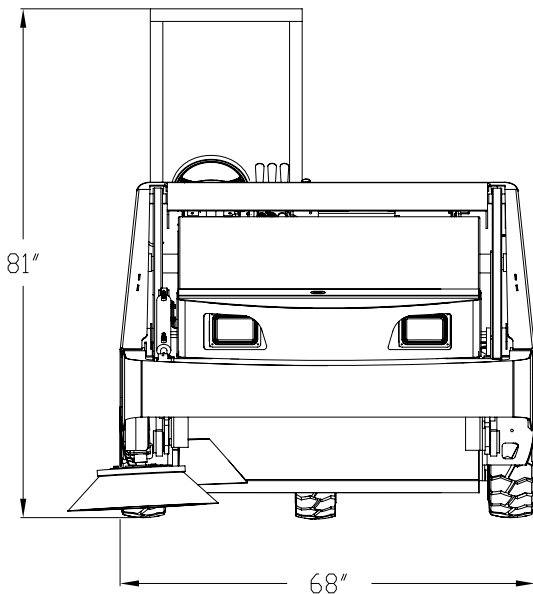


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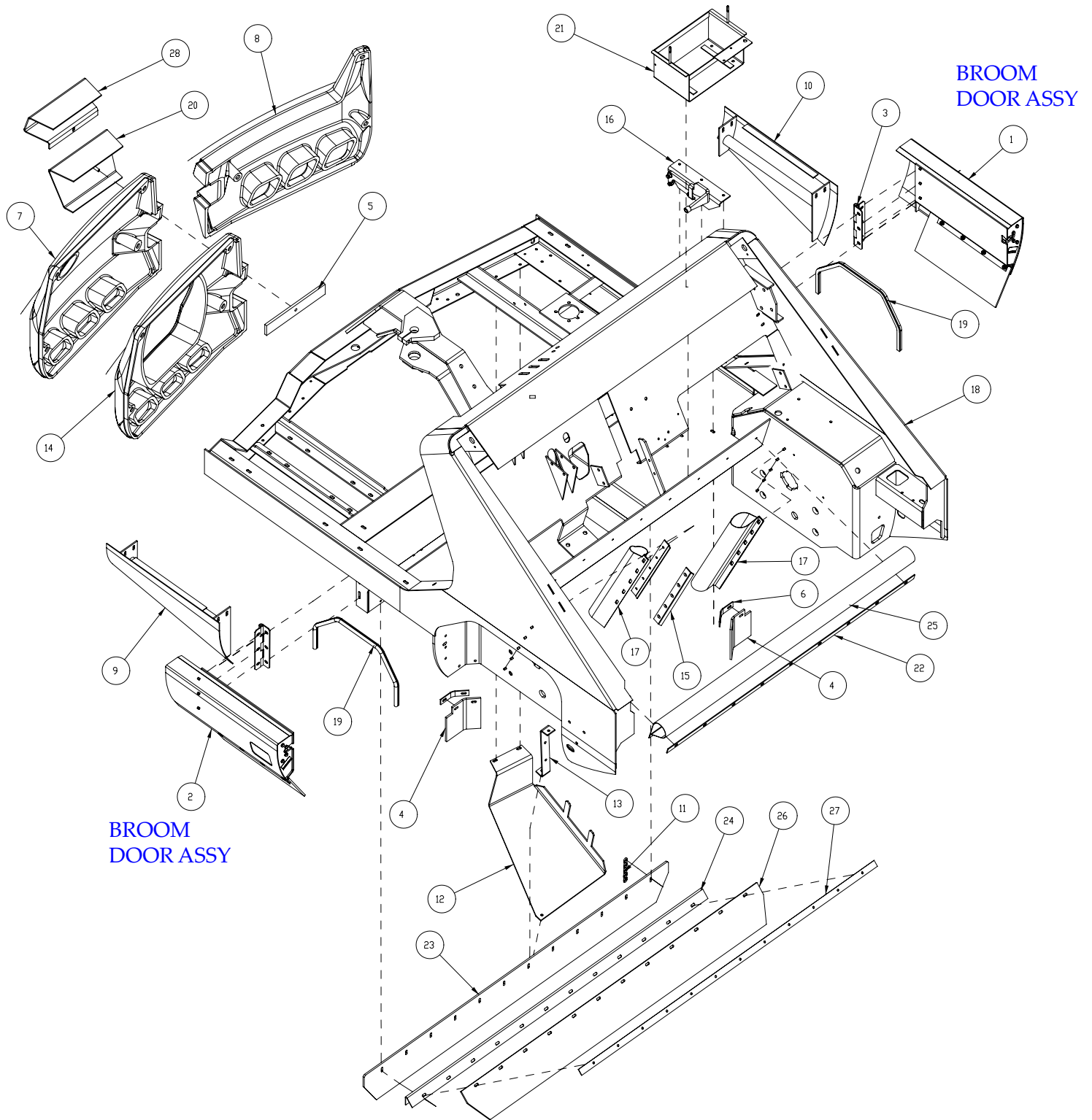
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STANDARD ABBREVIATIONS

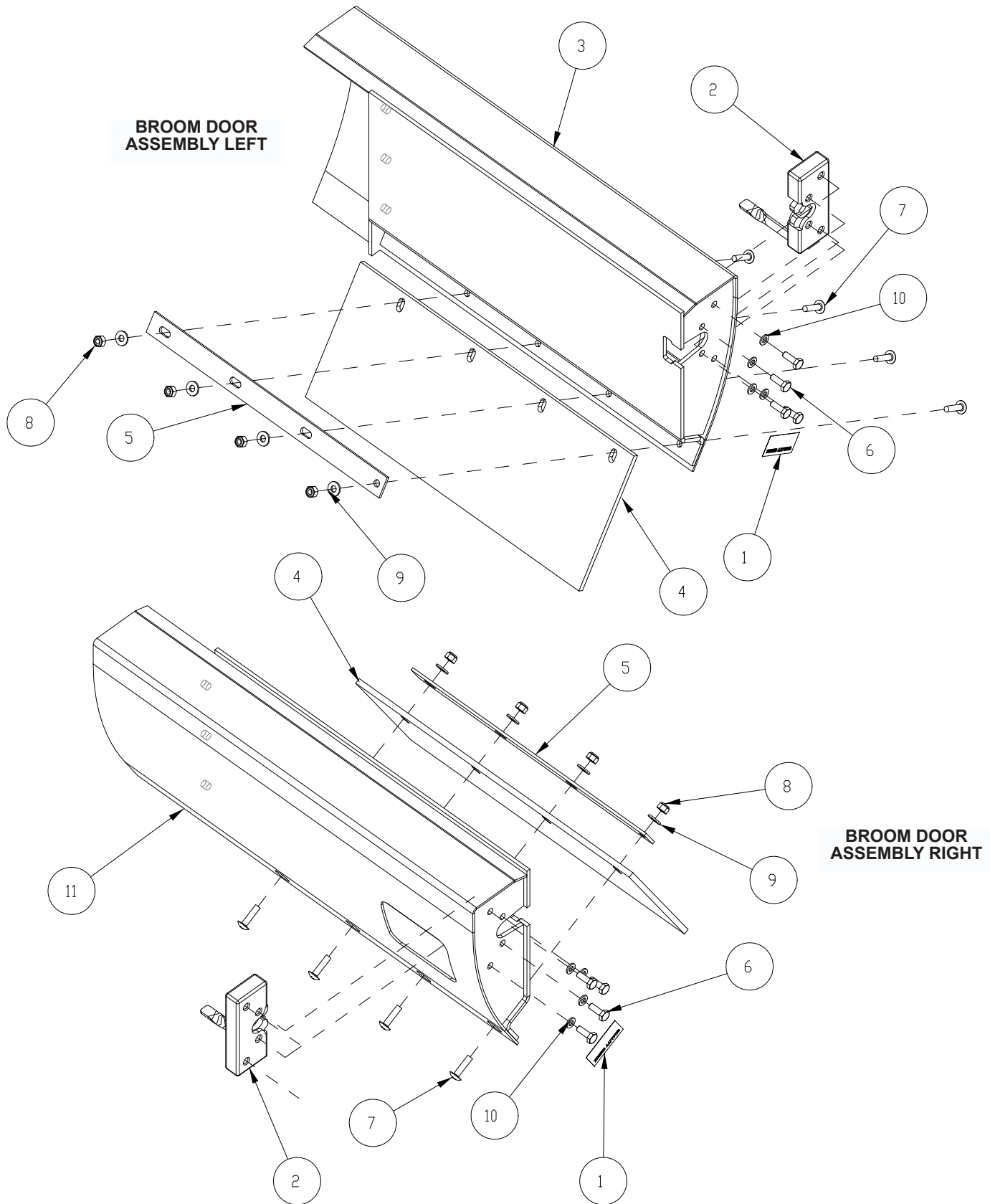
°C-Degrees Celsius	INFO-Information
°F-Degrees Fahrenheit	INT-Internal or Interior
12V-12 Volts DC	LG-Long
AR-Abrasion Resistant	LH-Left Hand
ASSY-Assembly	LPG-Liquefied Petroleum Gas
ATO-Standard Auto Fuse Type	LP-Liquefied Petroleum
Also called ATC	M8x1-Indicates Metric threads,
BHSCS-Button Head Screw SS	8mm Dia with a 1mm thread pitch
BLK-Black	MM-Millimeters
BLT-Belt	MNT-Mount
BR-Brass or Broom or Brush	MS-Mid Size
BRM-Broom	OD-Outside Diameter
BRKT-Bracket	PLTD-Plated
CB-Curb Broom	REV-Reverse
CCW-Counter Clockwise	RH-Right Hand
CI-Cubic Inch	ROT-Rotation
CW-Clockwise Rotation	RTR-Rotary Trash Relocator
CYL-Cylinder	SCR-Screw
DEG-Degrees	SC-Scrubber
DIA-Diameter	SP-Service Part
DPDT-Double Pole Double Throw	SPDT-Single Pole Double Throw
ELEC-Electric	SPST-Single Pole Single Throw
ES-Elastic Stop, also NYLOCK	SS-Stainless Steel
EXT-Exterior or Extended	STR-Straight
FI-Fuel Injection	ST-Straight
FS-Full Size	SUB-Sub Assembly
FTG-Fitting	THD-Thread
FWD-Forward	THK-Thick
REV-Reverse	THRU-Through
GAL-US Gallon (3.79 Liters)	UNC-Unified Nat'l Coarse Threads
GOV-Governor	UNF-Unified Nat'l Fine Threads
HD-Head	2203-Kubota Diesel Engine
HD-Heavy Duty	GM 1.6L-General Motors LP / Gasoline
HOP-Hopper	Engine
HSS-High Speed Steel	W/-With
HT-High Temperature	WELD-Weldment
HT-Height	W/O-Without
HYD-Hydraulic	SP-Zinc Plated
ID-Identification	
ID-Inside Diameter	
IMP-Impeller	

FRAME ASSEMBLY



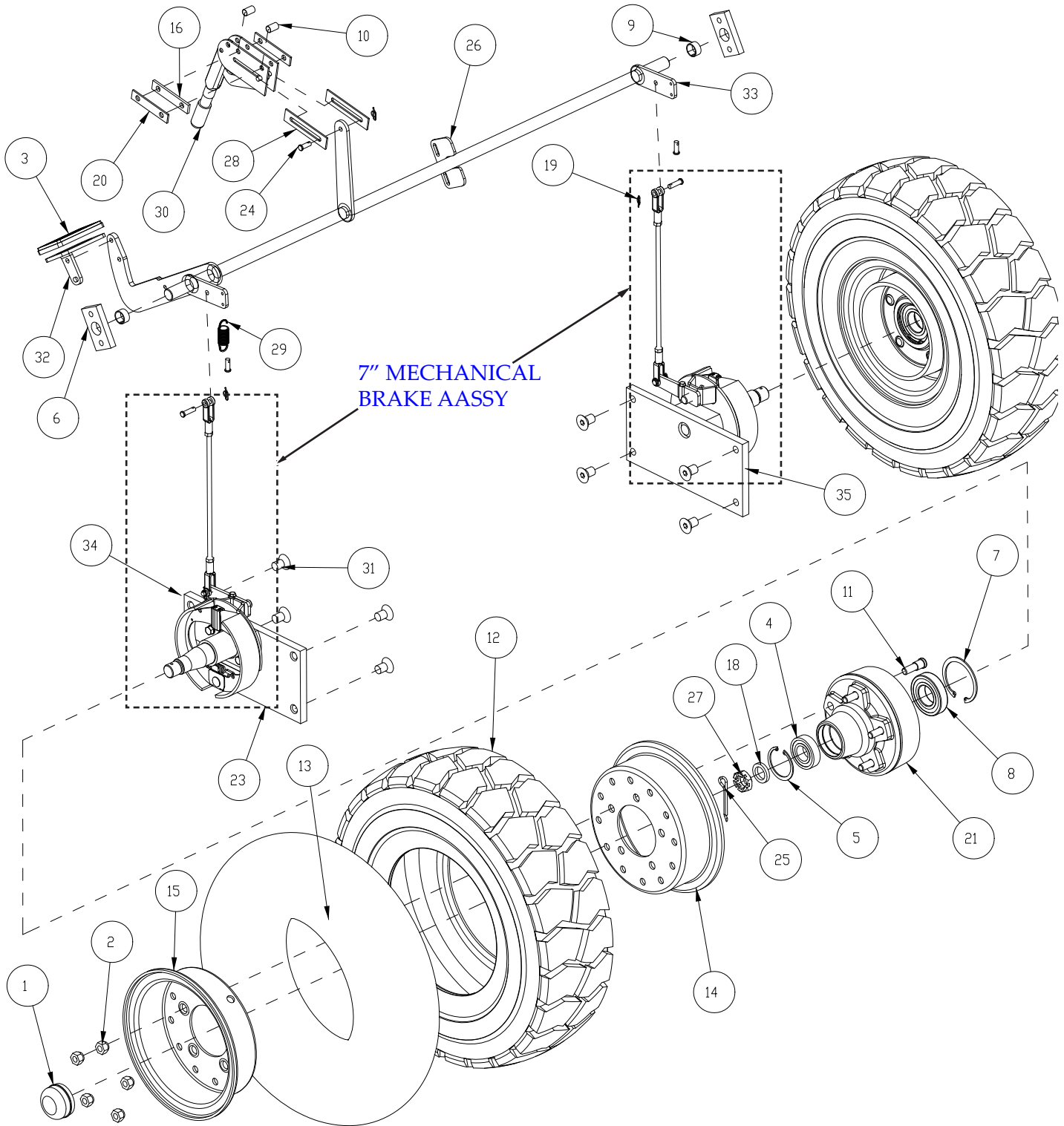
FRAME ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3307024	1	ASSEMBLY - BROOM DOOR LH 8/9/10x
2	3307025	1	ASSEMBLY - BROOM DOOR RH 8/9/10x
3	3307275	2	HINGE-BROOM DOOR SW/A PNTD
4	3307286	2	ARMA - BROOM CORNER FLAP
5	3350275	1	BACKING - CASTING COVER PNTD
6	3307287	2	ARMA - BROOM CORNER FLAP STRAP
7	3307320	1	COUNTERWEIGHT-RH MACHINED PNTD (GAS AND DIESEL MODELS)
8	3307321	1	COUNTERWEIGHT-LH MACHINED PNTD
9	3307519	1	WELD-SKIRT RH REAR SIDE PNTD
10	3307520	1	WELD-SKIRT LH REAR SIDE PNTD
11	3307658	1	CHAIN - FRAME GROUNDING
12	3307791	1	PAN - HOSE SW/A
13	3307792	1	BAR - HOSE PAN SUPPORT SW/A
14	3307835	1	COUNTERWEIGHT- RH LPG PNTD (LP MODEL ONLY)
15	3315203	2	RETAINER - HOPPER SIDE SEAL
16	3317117	1	ASSEMBLY - ENGINE LOCK SUB
17	3318143	2	SEAL - RUBBER HOPPER SIDE
18	3350153	1	FRAME WELD ASSY, 10X
19	3318739	3 ft.	WEATHER STRIPPING-RUBBER SPONGE
20	3350134	1	ASSY - LOWER CASTING COVER PNTD
21	3321296	1	WELD-BATTERY BOX ARMA
22	3350126	1	STRAP-FRAME HOPPER FLAP SW/10X
23	3350128	1	FLAP-REAR, SW/A
24	3350129	1	ARMA - REAR FLAP ANGLE
25	3350130	1	SEAL - FRAME HOPPER HORIZONTAL
26	3350131	1	FLAP - REAR FEED SW/A
27	3350132	1	STRAP - REAR FEED FLAP PAINTED
28	3350133	1	PLT - WD UPPER CASTING COVER
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

BROOM DOOR ASSEMBLY



BROOM DOOR ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	--XXX--	-	NOT SOLD SEPARATELY
2	3307246	1	LATCH-ROTARY
3	3307266	1	WELD-DOOR, LH BROOM, SW/A PAINTED
4	3307280	1	FLAP - MAIN BROOM DOOR
5	3307284	1	STRAP - BRM DOOR FLAP PNTD
6	3400042	4	SCR-HEX 1/4-20X.75 ZP
7	3400058	4	SCR-TRS 1/4-20 X 1.00 SLT ZP
8	3400081	4	NUT-HEX 1/4-20 ES ZP
9	3400089	4	WASHER 1/4 ID .63 OD X .065 THK
10	3400103	4	WASHER-LOCK 1/4 SPLIT ZP
11	3307265	1	WELD-DOOR, RH BROOM, SW/A PAINTED
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

AXLE, BRAKE AND WHEEL ASSEMBLIES



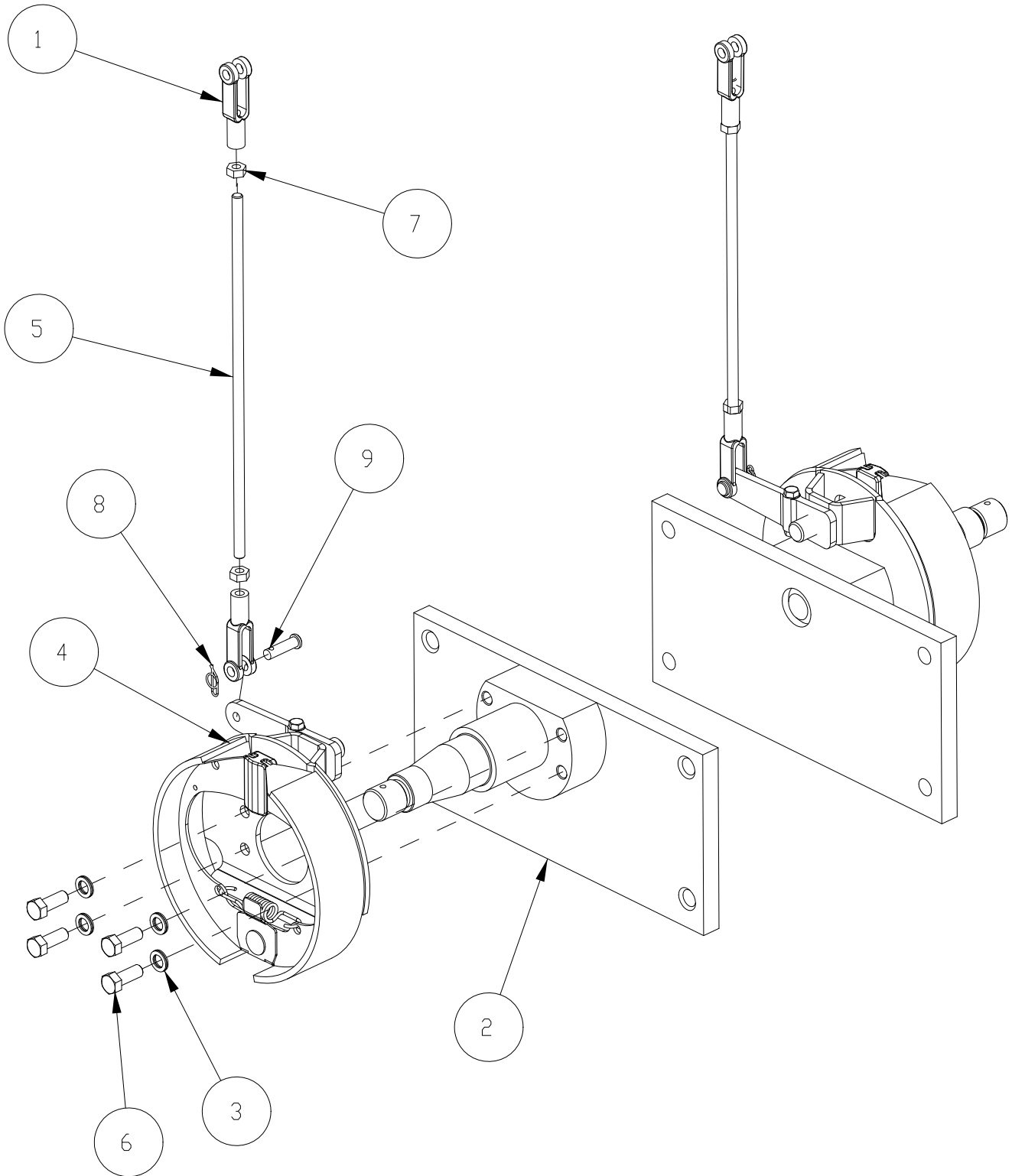
PARTS BREAKDOWN

AXLE, BRAKE AND WHEEL ASSEMBLIES

ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300369	2	CAP-HUB, 2.44" DIA.
2	3300411	10	NUT-LUG 1/2-20
3	3300413	1	PAD-BRAKE PEDAL
4	3300467	2	BEARING-BALL 2.44 OD X 1.18 ID
5	3300473	2	RETAINING RING, INT 2.44
6	3307233	2	MNT- BRG - BRAKE
7	3307237	2	RING - RET. INT. INNER WHEEL SW/A
8	3307238	2	BEARING - INNER WHEEL SW/A
9	3307239	2	BEARING-BRAKE ARM SW/A
10	3307241	2	SPACER-HAND BRAKE PLTD SW/A
11	3307242	10	STUD - WHEEL, 1/2-20X1.75 LG
12	3307252	2	TIRE-PNEUMATIC 6.50X10
13	3307253	2	TUBE - TIRE INNER, 600x9
14	3307254	2	RIM - REAR INNER SW/A
15	3307255	2	RIM - REAR OUTER SW/A
16	3307273	1	ARMA-HAND BRAKE SPACER
17	BLANK	-	NOT USED
18	3307352	2	ARMA - FRONT HUB WASHER
19	3400125	5	PIN-COTTER 3/8 RUE RING
20	3307895	2	SPACER THIN-HAND BRAKE SW/A
21	3318288	2	HUB - 7 INCH I.D.
22	BLANK	-	NOT USED
23	3334058	2	WELDMENT - FRONT AXLE
24	3400118	3	PIN-CLEVIS 5/16 x 7/8 ZP
25	3400120	2	PIN-COTTER 5/32 X 2.00 ZP
26	3334060	1	SUPPORT - MANUAL BRAKES SW/A
27	3400076	2	NUT-HEX JAM SLOTTED, 1-14 ZP
28	3334087	2	BAR-PARKING BRAKE SLIDER
29	3334098	2	SPRING-MANUAL BRAKE
30	3334173	1	LEVER-HAND BRAKE SW/A
31	3400011	8	SCREW-FLAT HEAD 5/8-11 X 1.00, SOC ZP
32	3337386	1	PLT - BRAKE PEDAL
33	3337543	1	WELDMENT - BRAKE BAR, 2PC
34	3334064	1	ASSY-AXLE 7" BRAKE RH SUB
35	3334065	1	ASSY-AXLE 7" BRAKE LH SUB

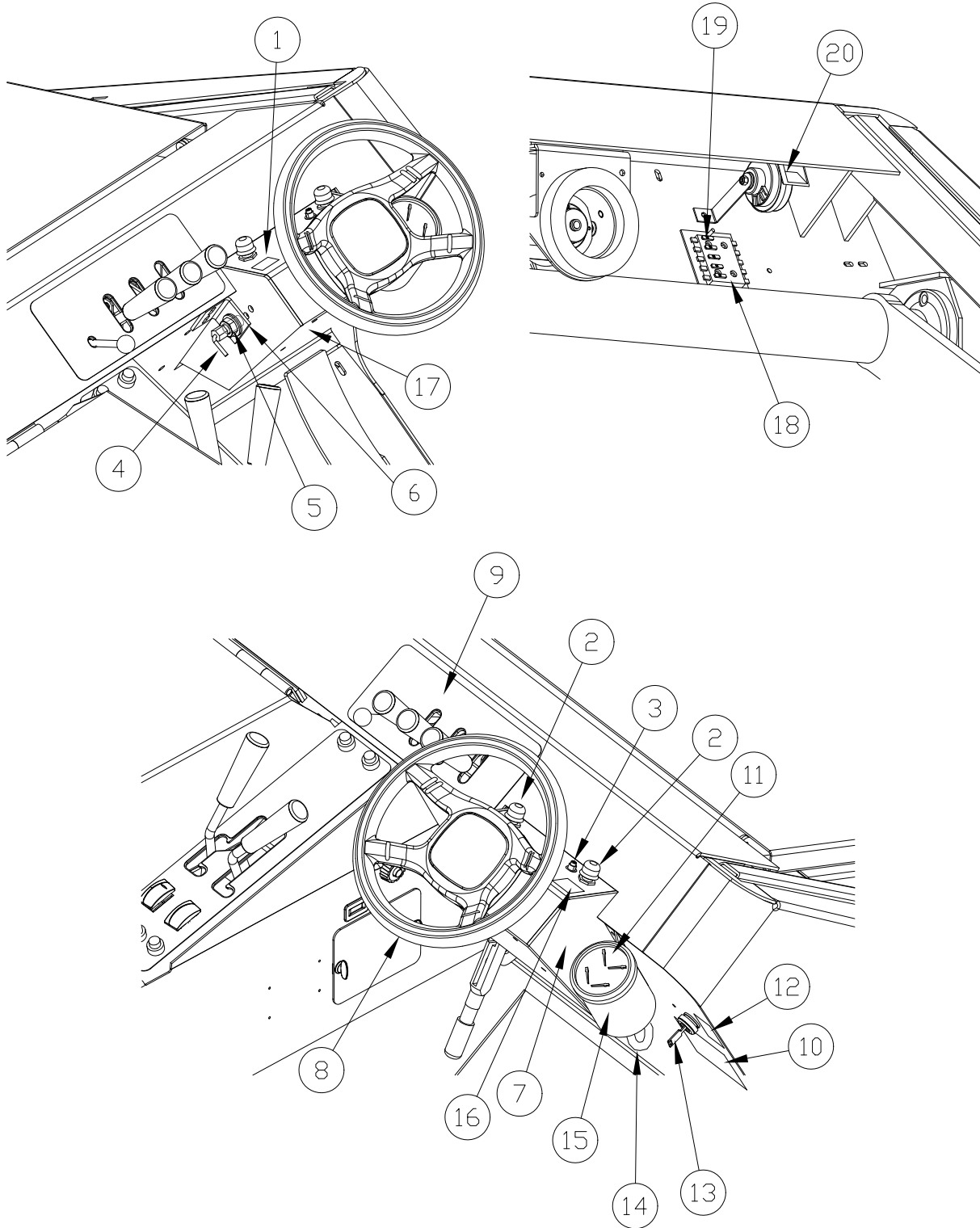
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

7" MECHANICAL BRAKE ASSEMBLY



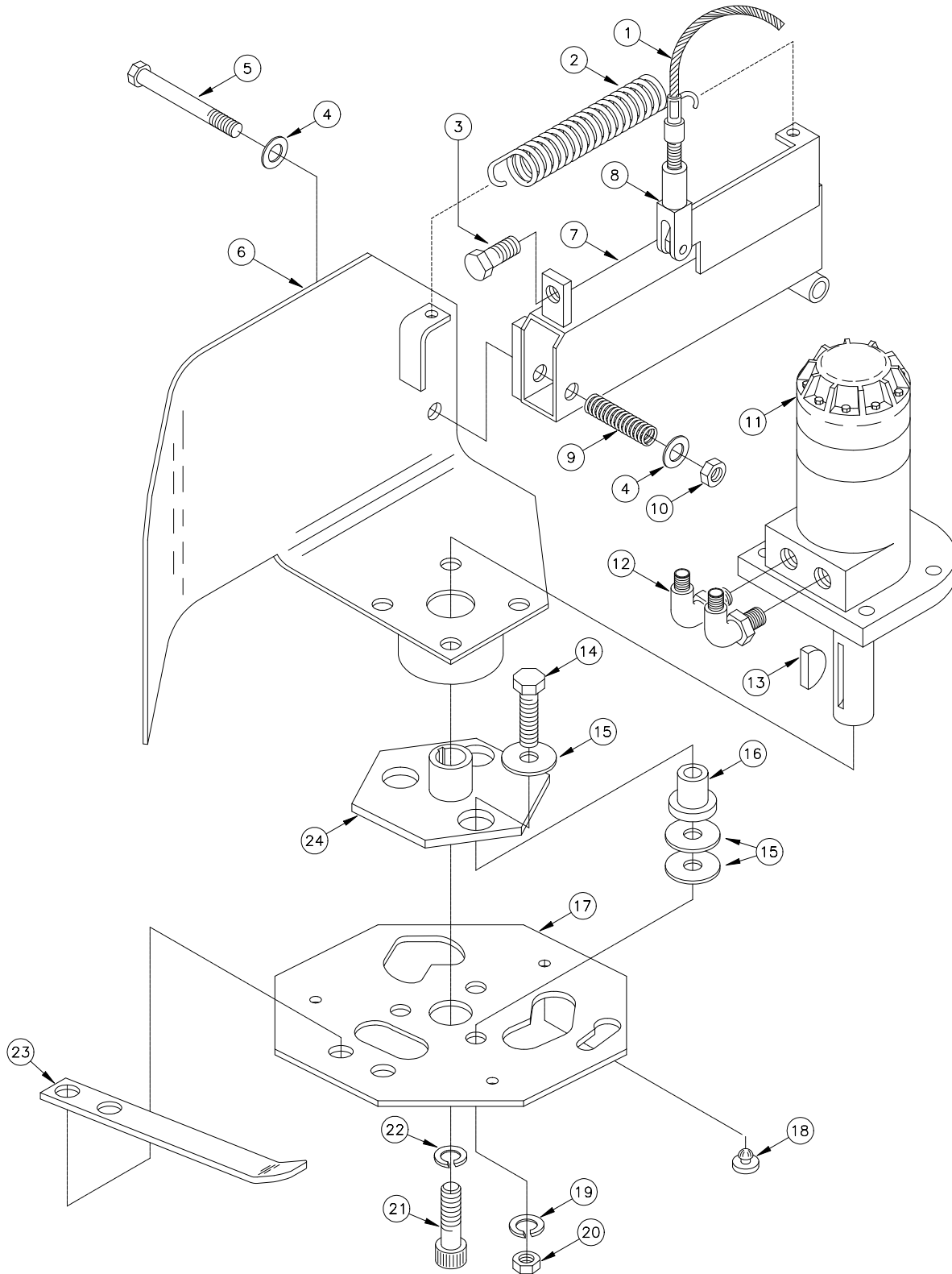
7" MECHANICAL BRAKE ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3307642	2	CLEVIS-5/16 PLTD SW/A
2	3334058	1	WELDMENT - FRONT AXLE
3	3401570-9	4	WASHER-NORD-LOCK, 3/8, ZP
4	3334059	1	BRAKE - 7" MANUAL LH&RH
5	3334061	1	ROD - MANUAL BRAKE ADJUST
6	3400030	4	SCREW-HHM 3/8-16 X 1.0 LG ZP
7	3400069	2	NUT-HEX 5/16-24 ZP
8	3400125	1	PIN-COTTER 3/8 RUE RING
9	3400184	1	PIN-CLEVIS 5/16 x 1-1/8 ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

STEERING WHEEL, GAUGES & FUSES



STEERING WHEEL, GAUGES & FUSES			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3302520	1	DECAL-"FILTER SHAKER"
2	3300441	2	SWITCH MOMENTARY
3	3026924	1	CIRCUIT BREAKER-45AMP
4	3337002	1	PIN-QUICK RELEASE PLUNGER
5	3400192	2	NUT-JAM, 5/8-11 (ONE SHOWN)
6	3332453	1	MOUNT-TILT STEERING PIN
7	3333714	1	WELDMENT-TILT STEERING
8	3318220	1	STEERING WHEEL-W/COVER
9	3307594	1	DECAL-FRONT PANEL
10	3301854	1	DECAL-"CAUTION"
11	3333721	1	GAUGE-4 IN 1, 3.50" DIA
12	3307599	1	DECAL-IGNITION
13	3316100	1	SW-IGNITION, 3-POS, W/STARTER LOCKOUT
	3322562	1	SET OF (2) SPARE KEYS
14	3333720	1	HARNESS-INSTRUMENT PANEL
15	3333719	1	WELDMENT-GAUGE MOUNT
16	3302525	1	DECAL-"HORN"
17	3333717	1	COVER-TILT STEERING
18	3322599	1	FUSE BLOCK-ATO, 10 POSITION
19	3322601	5	FUSE-15 AMP AUTOMOTIVE PUSH IN
20	3300379	1	HORN-AUTOMOTIVE 12V
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

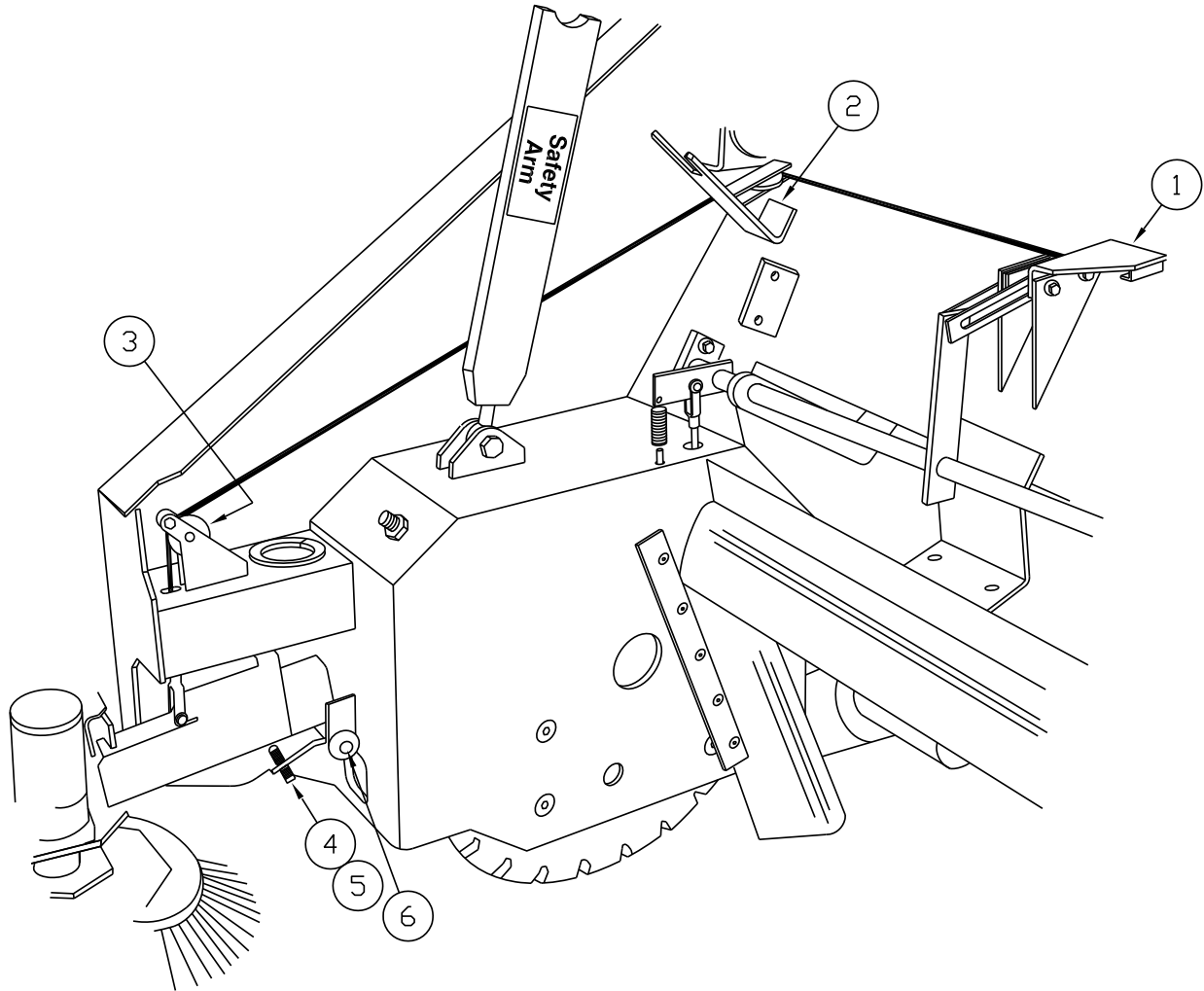
SIDE BROOM ASSEMBLY - DRIVE MOTOR, ARM AND MOUNTING



PARTS BREAKDOWN

SIDE BROOM ASSEMBLY - DRIVE MOTOR, ARM AND MOUNTING			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3335120	1	CABLE-SIDE BROOM
2	3302599	1	SPRING-EXT LOOPS-IN-LINE
3	3400029	1	SCR-HEX,3/8-16X1.25
4	3400087	4	WASHER-FLAT 3/8 STANDARD
5	3400258	1	SCR-HEX,3/8-24X4.00
6	3307654	1	RH SIDE BROOM MOUNT PNTD
	3309782	1	LH SIDE BROOM MOUNT PNTD (OPTIONAL)
7	3307527	1	RH CURB BROOM ARM PNTD
	3309778	1	LH CURB BROOM ARM PNTD(OPTIONAL)
8	3307642	1	CLEVIS-5/16
9	3306179	2	SPRING-COMPRESSION, CURB BROOM
10	3400342	1	NUT-HEX 3/8-24 ES
11	3316897	1	MOTOR-HYD CURB BROOM
12	3400155	1	FTG-90° 7/8-14 TO #8
13	3330338	1	KEY-SHAFT D-FOSS CB/MB/SC MTRS
14	3400028	3	SCR-HEX,3/8-16x1.50
15	3400278	9	WASHER-FENDER 3/8
16	3300465	3	ISOLATOR-RUBBER (.375IDx.81OD)
17	3301262	1	PLATE-GIMBAL SC HD
18	3300526	3	BUMPER-RUBBER 1/4IDx1/8 THK
19	3400101	3	WASHER-LOCK 3/8 SPLIT
20	3400068	3	NUT-HEX 3/8-16
21	3400049	1	SCR-SOCKET HEAD,1/4-20X0.75 NYLOCK
22	3400103	1	WASHER-LOCK 1/4 SPLIT
23	3302058	1	BAR-CURB BROOM RETAINER
24	3300875	1	WELDMENT-DRIVE HUB SC BR
-	3301474	1	SUB ASSY-DRIVE SCRUB BRUSH/CURB BROOM (INCLUDES ITEMS14-18 & 23-24)
-	3307033	1	SUB-CURB BROOM (INCLUDES ITEMS 2-7 & 9-24)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

SIDE BROOM ASSEMBLY - ADJUSTMENT COMPONENTS

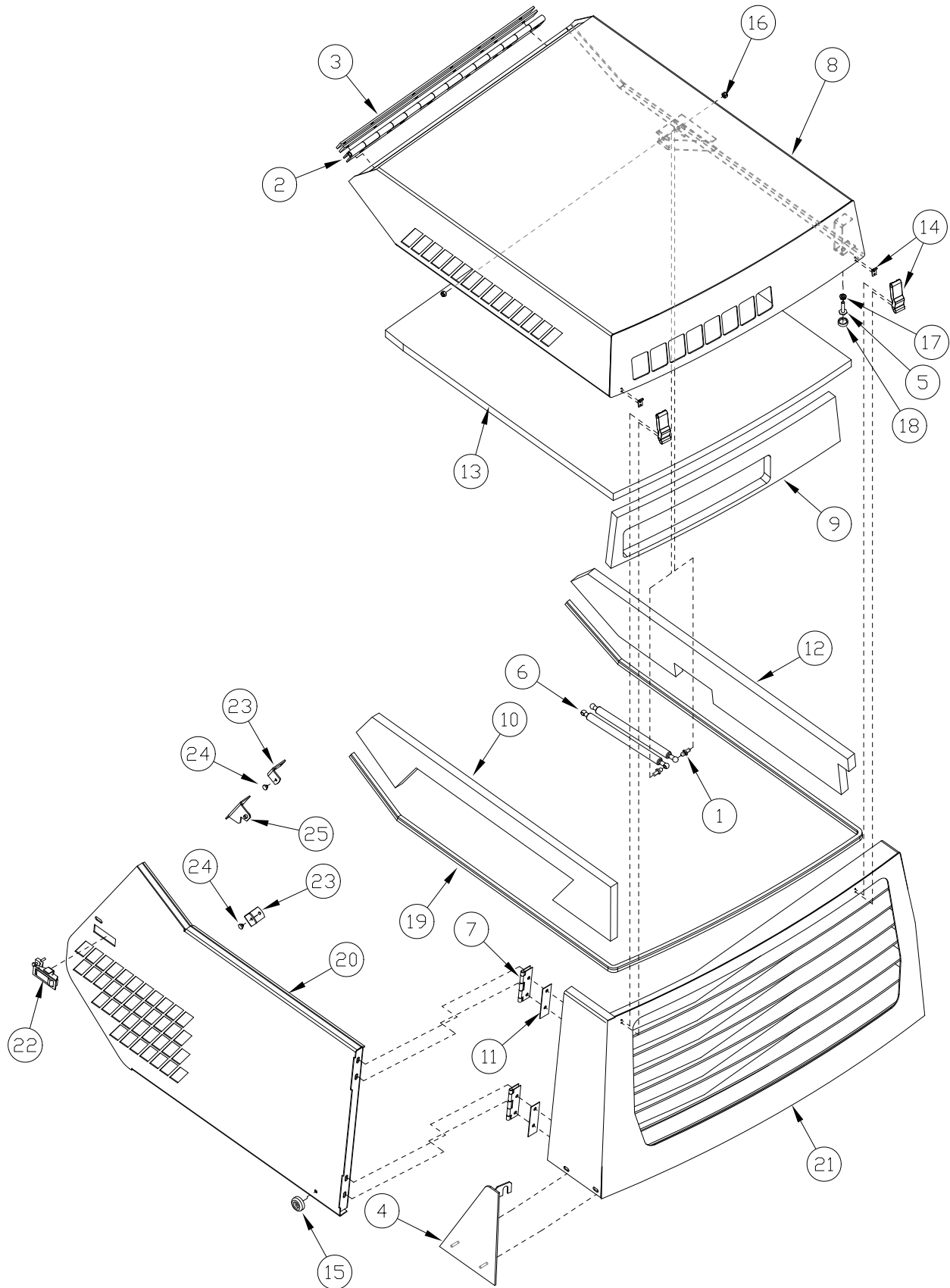


SIDE BROOM ASSEMBLY - ADJUSTMENT COMPONENTS

ITEM	PART NO.	REQ'D	DESCRIPTION
1	3307861	1	WELDMENT-PULLEY MOUNT #3
2	3307865	1	WELDMENT-SAFETY ARM RETAINER/PULLEY MOUNT
3	3300368	3	PULLEY-PLASTIC ϕ 2", ϕ .25" GROOVE
4	3400404	1	SCR-SET,1/2-20X3.00
5	3400449	1	NUT-HEX JAM 1/2-20 (NOT SHOWN)
6	3307794	1	PIN-CLEVIS 1/2 X 4-1/2

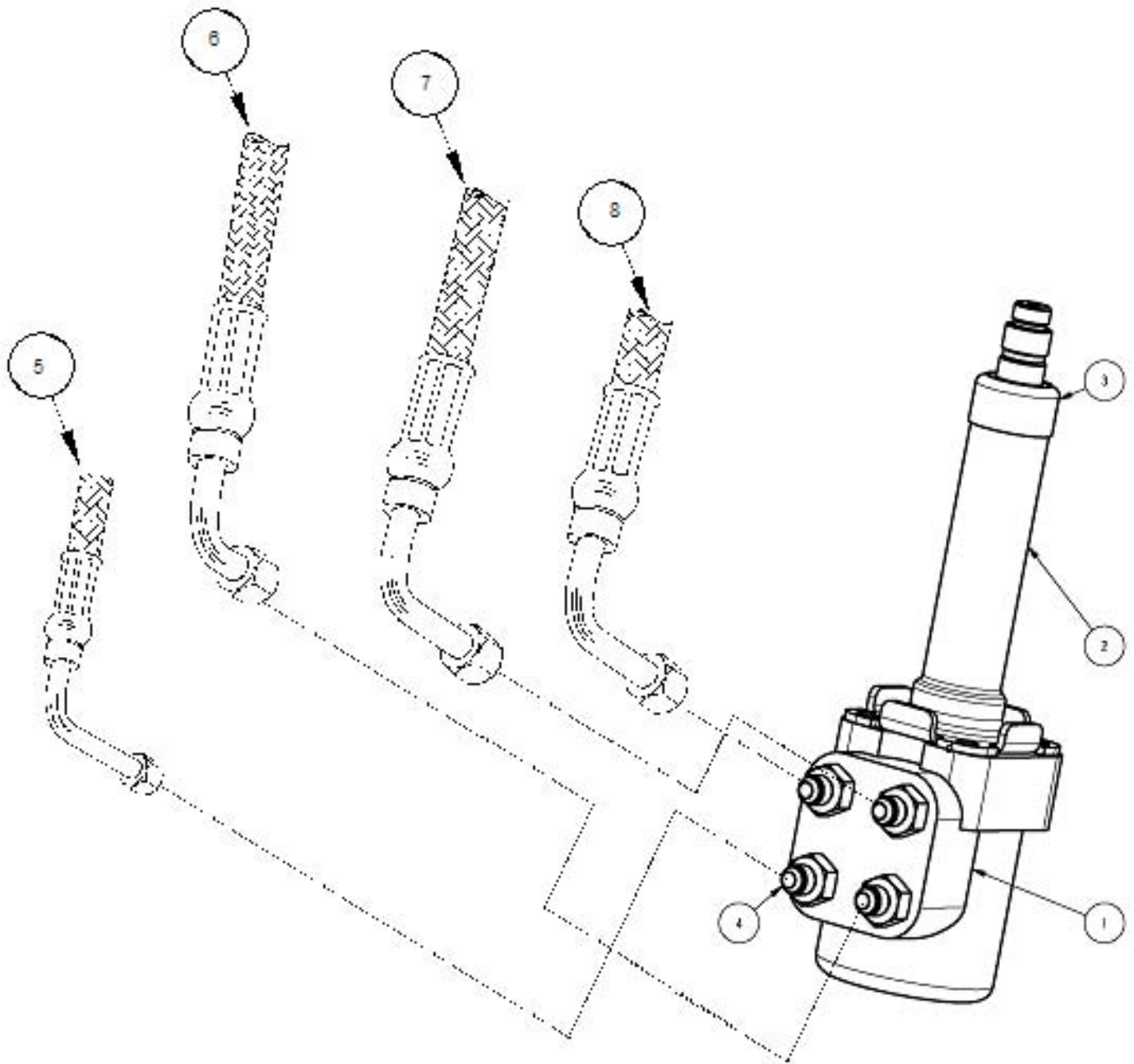
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE COVER, SIDE DOOR, LATCH & REAR GRILL



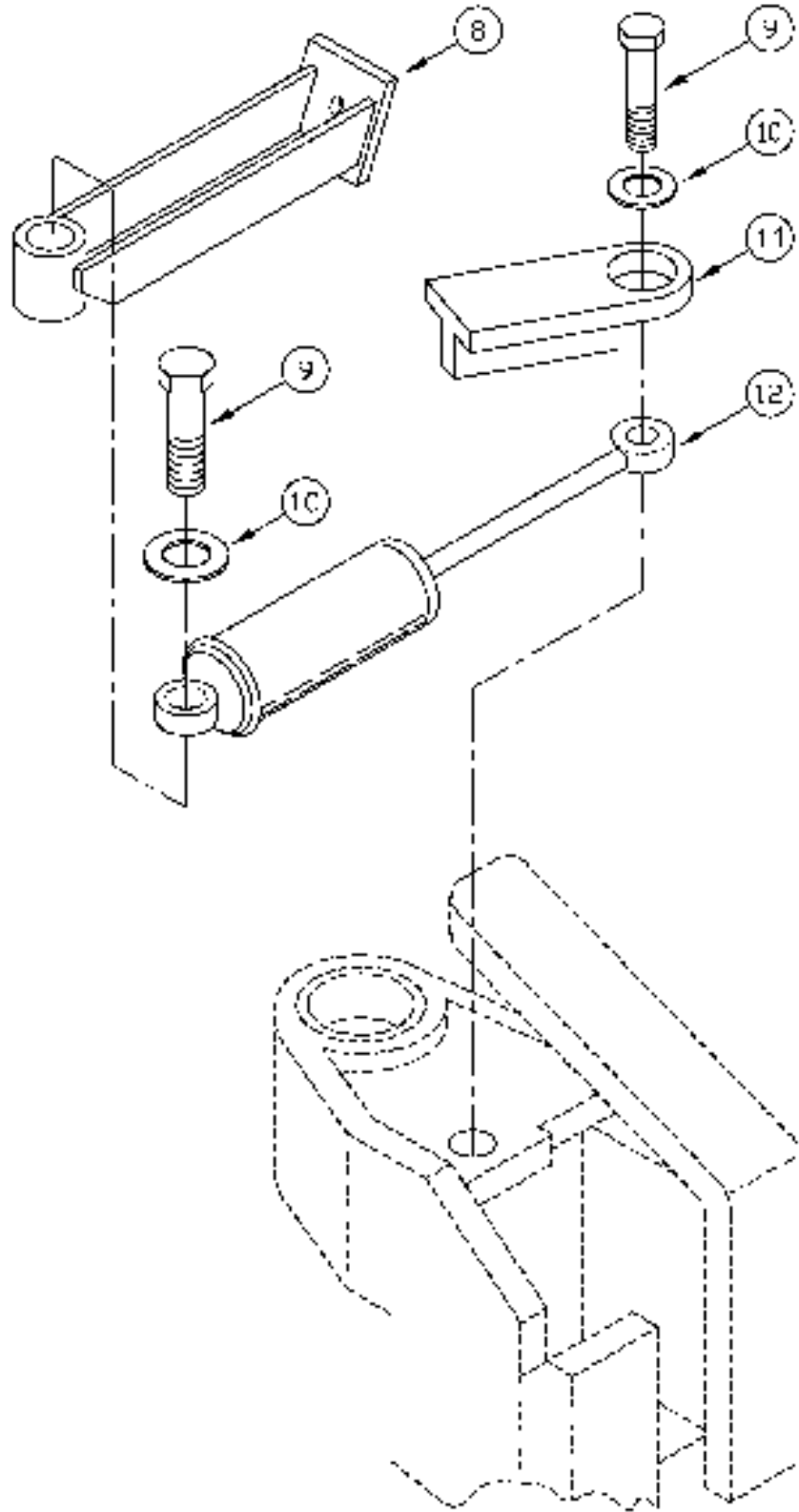
ENGINE COVER, SIDE DOOR, LATCH & REAR GRILL			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300376	4	STUD-BALL 10MM
2	3350189	1	HINGE-ENGINE COVER SW/10X
3	3350207	2	SPACER-HINGE ENG COVER SW/10X
4	3307799	1	CORNER GUARD SW/A PNTD
5	3307639	1	LEVELER-5/16-18x1.5", 1" DIA,
6	3308767	2	GAS SPRING-8" STROKE
7	3307560	-	SPACER-METAL, 0.060" THK SIDE DOOR (USE AS REQUIRED)
8	3335826	1	ENGINE COVER 10X ORANGE
9	3335831	1	INSULATION - ENG COVER BACK 10X
10	3335767	1	INSULATION - ENG COVER LH
11	3307513	2	HINGE-SIDE DOOR
12	3335766	1	INSULATION - ENG COVER RT
13	3335830	1	INSULATION-ENG COVER TOP 10X
14	3307719	2	LATCH-RUBBER SOFT
15	3302482	1	BUMPER-RUBBER, 1.5" DIA, 5/8 THK
16	3400080	4	NUT-HEX 5/16-18 ES
17	3400390	1	NUT-FLANGE LOCK 5/16-18
18	3401076	1	CAP-RUBBER, ADJ. SCR
19	3500198	10'	SEAL - TRIM
20	3307510	1	DOOR ,SIDE 10X ORANGE
21	3332418	1	RADIATOR GUARD 10X ORANGE
22	3300380	1	LATCH ASSY-#C2-10-301-50
23	3307515	2	STOP-90° SIDE DOOR, W/BUMPER
24	3300526	2	BUMPER-RUBBER 1/4IDx1/8 THK
25	3307529	1	WELDMENT-DOOR STRIKE
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

HYDRAULIC HOSES, STEERING UNIT & COLUMN



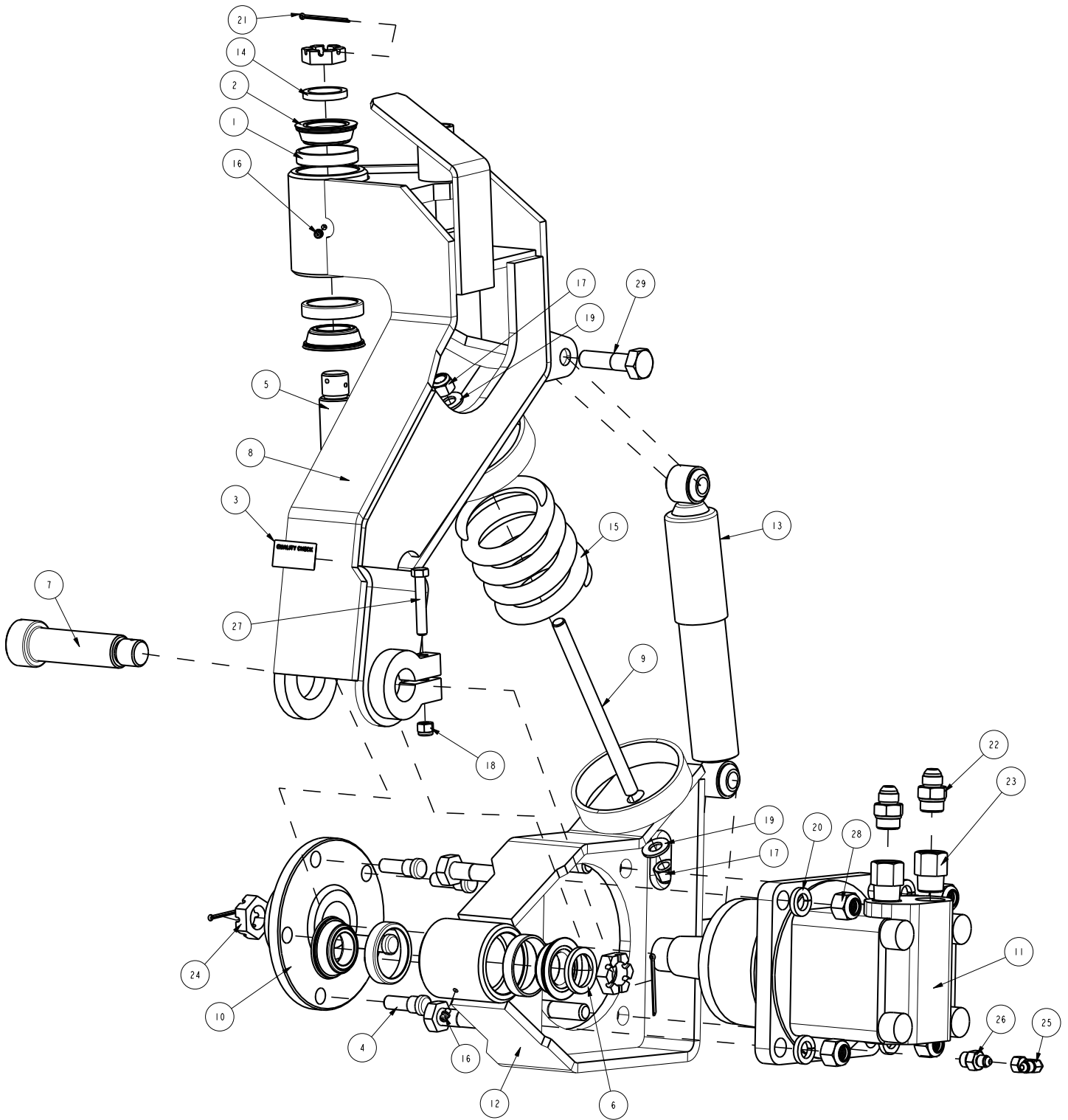
HYDRAULIC HOSES, STEERING UNIT & COLUMN			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3316899	1	POWER STEERING UNIT
2	3316900	1	STEERING COLUMN-POWER STEERING
3	3324015	1	BOOT-STEERING COLUMN RUBBER
4	3400648	4	FTG-ADPT ST THD 3/4-16 TO #6
5	3350220	1	HOSE-3/8HT93.ST#6 90L#8 SL/LOK
6	3350219	1	HOSE-3/8HT84.ST#6 90L#8 SL/LOK
7	3350276	1	HOSE-3/8HT 110.00 ST#6 90L#8
8	3350349	1	HOSE-.25 AR 158" ST#4(S) 90 #4(L)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

STEERING CYLINDER



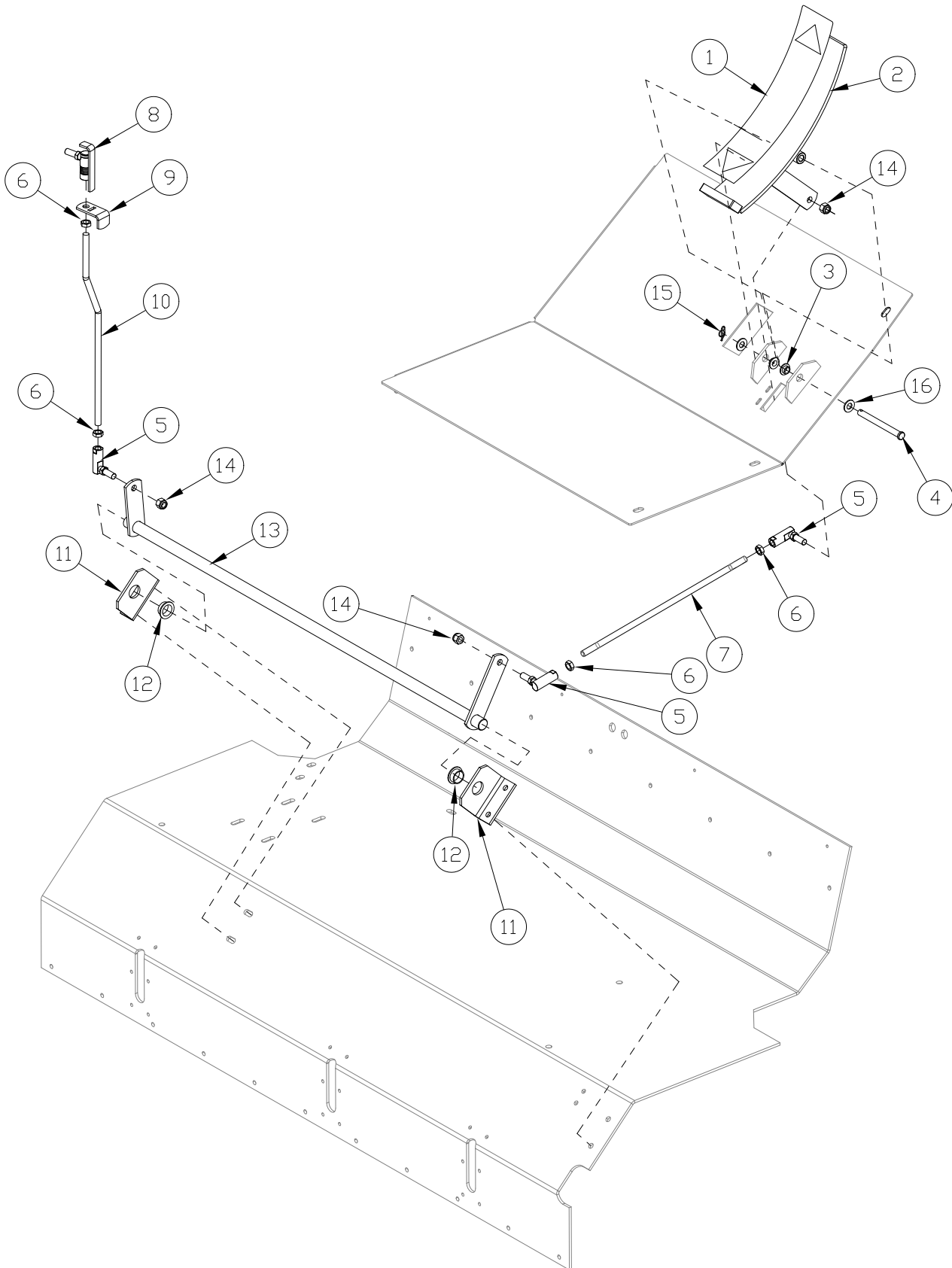
STEERING CYLINDER			
ITEM	PART NO.	REQ'D	DESCRIPTION
8	3317370	1	STEERING MNT-ARMA PNTD
-	3400022	2	SCR-HEX,1/2-13X1.25 ZP
-	3400098	2	WASHER-LOCK 1/2 SPLIT ZP
-	3400065	2	NUT-HEX 1/2-13 ZP
9	3400422	2	SCR-HEX,3/4-10X5.00 ZP
10	3400440	2	WASHER-FLAT .812 ID X 2.0 OD
-	3400143	2	NUT-HEX 3/4-10 ZP
11	3309080	1	STEERING STOP ARMA PNTD
12	3307311	1	CYLINDER-STEERING ARMA & POWER
-	3300879	2	WASHER-HD 3.25 ODx1.00 ID
-	3400685	2	FTG-6-5C5OLO-S ST THD ELL S-LOK
-	3400435	2	WASHER-LOCK 3/4 SPLIT ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

REAR DRIVE ASSEMBLY



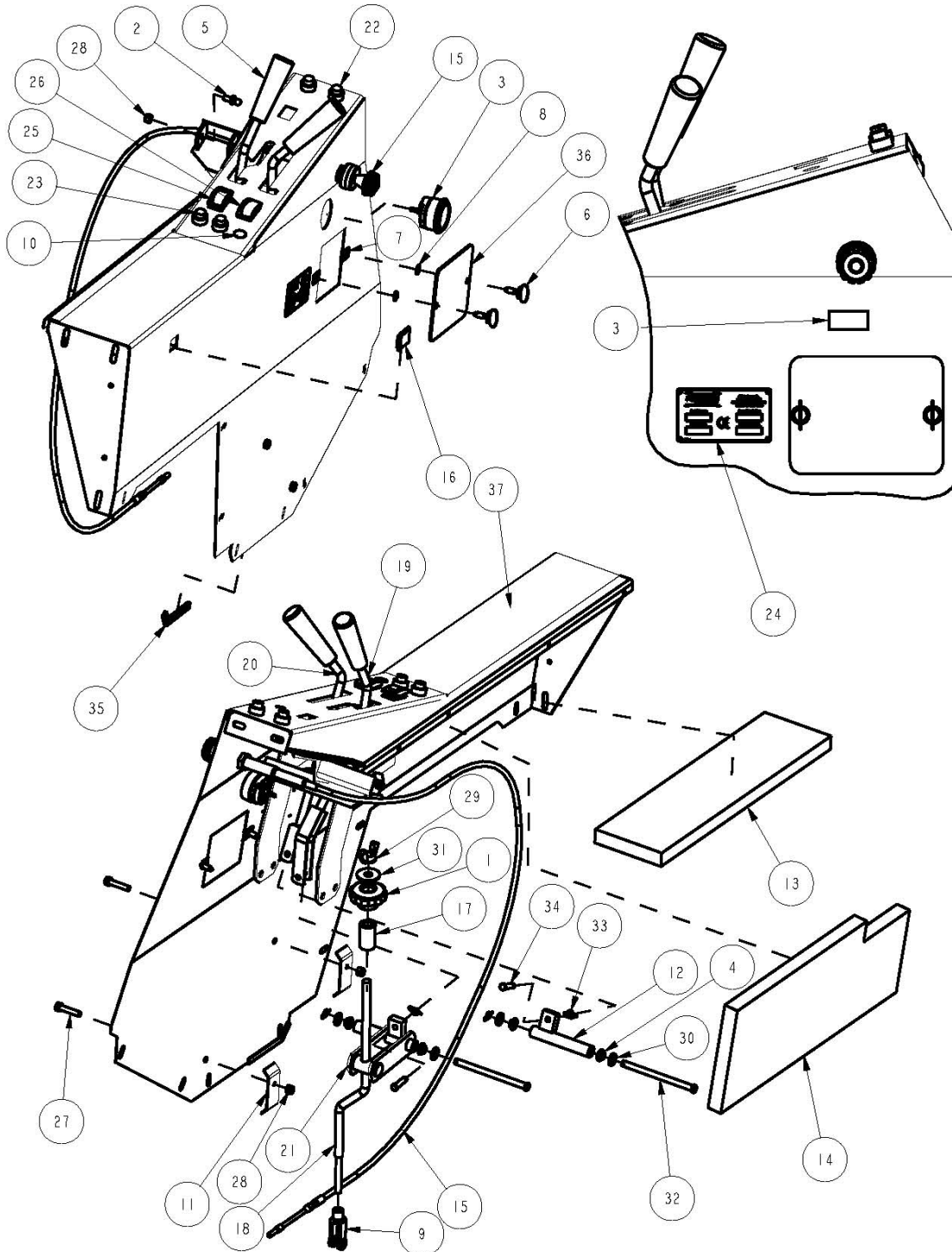
REAR DRIVE ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300470	4	BEARING-TAPERED ROL CUP
2	3300471	4	BEARING-TAPERED ROLCONE W/SEAL
3	--XXX--	-	NOT SOLD SEPARATELY
4	3307348	5	STUD - WHEEL, 1/2-20X 1.63 (REAR SW/A)
5	3307349	1	PIN - REAR FORK SW/A
6	3309594	1	SPACER-POWERFLEX PLTD
7	3309790	1	PIN-KNEE POWERFLEX FABRICATED
8	3316888	1	WELDMENT - STEERING FORK
9	3319410	1	ROD-TENSION POWER FLEX
10	3321150	1	HUB-REAR ARMA OMTW SERIES
11	3321151	1	MOTOR-DRIVE ARMA OMTW SERIES
12	3321170	1	MNT-MOTOR P-FLEX 10X
13	3321176	1	SHOCK ABSORBER-POWER FLEX
14	3337860	1	SPACER-STEERING FORK
15	3350209	1	SPRING-POWER FLEX ARMA
16	3400012	2	FTG-GREASE 3/16 DRIVE
17	3400078	2	NUT-HEX 1/2-13 ES ZP
18	3400079	1	NUT-HEX 3/8-16 ES ZP
19	3400086	2	WASHER-FLAT 1/2 STANDARD ZP
20	3400097	4	WSR-LOCK 5/8
21	3400122	3	COTTER PIN 1/8 X 2
22	3400151	2	FTG-7/8-14 STOR TO 3/4-16 JIC 37 DEG
23	3400168	2	FTG-ADAPTER 1 1/6-12 EXT TO
24	3400223	3	NUT-SLOTTED, 1-20UNEF
25	3400245	1	FTG-90 SWIVEL 4JIC
26	3400264	1	FTG-STR 4MJIC X 6MORB
27	3400339	1	SCR-HEX 3/8-16 X 2.25
28	3400483	6	NUT-NYLON LK 5/8-11
29	3400485	6	SCR - HHM 5/8 - 11 X 2.5 ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

DIRECTIONAL CONTROL LINKAGE ASSEMBLY



DIRECTIONAL CONTROL LINKAGE ASSEMBLY					
ITEM	PART NO.			REQ'D	DESCRIPTION
	GAS	LP	DSL		
1	3300544			1	PAD-FOOT PEDAL
2	3337390			1	PEDAL - FWD/REV, ARMADILLO 1-PC
3	3300414			2	BUSHING-PLASTIC FLANGED, .375IDx.50OD
4	3400114			1	PIN-CLEVIS, 3/8x4
5	3300461			2	BALL JOINT-3/8-24
6	3400075			4	NUT-JAM, 3/8-24
7	N/A	N/A	3307222	1	ROD-DIRECTIONAL CONTROL, DIESEL
	3307221	3307221	N/A	1	ROD-DIR CONTROL SW/A GAS/LP
8	3307611			1	QUICK RELEASE- FWD/REV
9	3307613			1	HANDLE-QUICK RELEASE
10	N/A	N/A	3307938	1	ROD-DIRECTIONAL CONTROL DIESEL
	3335278	3335278	N/A	1	ROD-CONTROL, FWD/REV, ARMA
11	3307223			2	MOUNT-DIRECTIONAL CONTROL
12	3307220			2	BUSHING-PLASTIC FLANGED,
13	3350188			1	DIRECTIONAL TORQUE TUBE
14	3400342			4	NUT-HEX 3/8-24 ES ZP
15	3400125			1	PIN-COTTER 3/8 RUE-RING
16	3400087			1	WASHER-FLAT 3/8 STANDARD ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS					

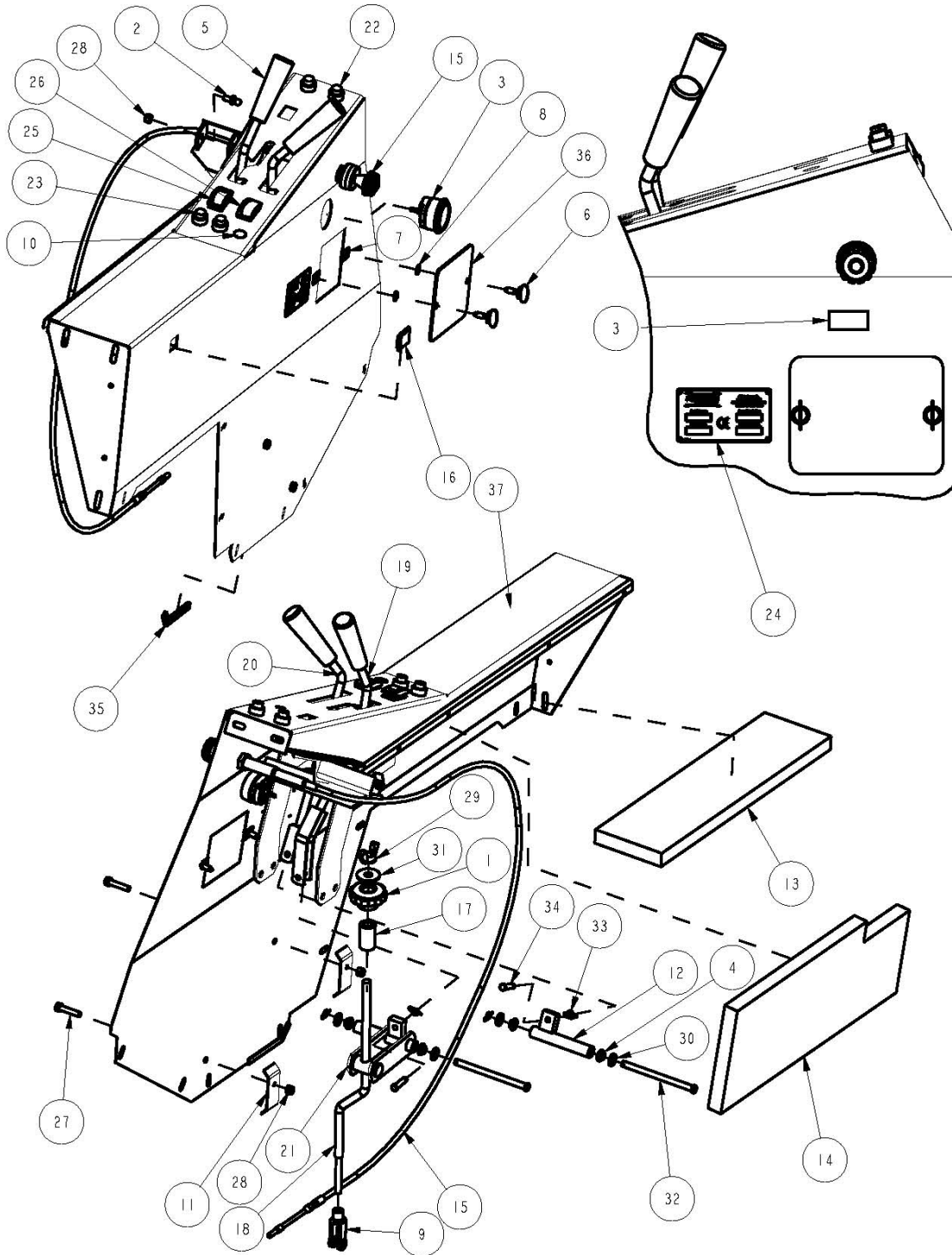
CONSOLE ASSEMBLY



CONSOLE ASSEMBLY					
ITEM	PART NO.			REQ'D	DESCRIPTION
	GAS	LP	DSL		
1	3300352			1	KNOB-MB LIFT ADJ.
2	3300376			2	STUD-BALL, GAS SPRING, 5/16-18
3	3336094			1	GAUGE-HOUR METER, DIGITAL, SNAP
4	3300414			4	BUSHING-PLASTIC 3/8IDx1/2OD
5	3300558			2	KNOB-PLASTIC TAPERED #145 BLACK
6	3301147			2	SCR-5/16 ACME THD, WING HEAD,
7	3301155			2	CLIPNUT-5/16-18
8	3301156			2	RETAINER-CAPTIVE SCREW
9	3301447			1	CLEVIS WITH PIN AND COTTER
10	N/A	N/A	3301669	1	PLUG-PLASTIC, 11/16 DIA
11	3305398			2	CLAMP-HYD HOSE, PLATED
12	3307614			1	WELD-PIVOT SB LIFT
13	3307846			1	INSULATION-CONSOLE TOP
14	3307847			1	INSULATION-DRIVER COMP SIDE
15	N/A	N/A	3321179	1	CABLE-THROTTLE (Diesel Only Special)
	3330356	3330356	N/A	1	PLUG-PLASTIC HOLE, 3/4, 7 GA
16	3323529			1	PLUG-CARLING CONTURA SWITCH
17	3333672			1	SPACER-MB LIFT ROD
18	3334984			1	ROD-MAIN BROOM, LOWER
19	3334987			1	WELD-ROD, MAIN BROOM, UPPER
20	3335001			1	WELD-ROD, SIDE BROOM, UPPER
21	3335112			1	WELD-LIFT ARM, MAIN BROOM,
22	3335320			1	SUB-LIGHTS, RTR INDICATOR (Includes Lights & Harness)
23	3335321	3335321	N/A	1	ASSY- LIGHTS(Includes 2 Red Lights, 1 Amber & Harness)
	N/A	N/A	3335703	1	ASSY-LIGHTS(Includes 2 Red Lights & Harness)
24	3335800			1	ID PLATE-SERIAL # INFO
25	3342273			1	HEADLIGHT SWITCH
26	3342703	3342703	N/A	1	THROTTLE SWITCH
	N/A	N/A	3343912	1	GLOW PLUG SWITCH
27	3400033			2	SCR-HEX,5/16-18X1.50
28	3400080			2	NUT-HEX 5/16-18 ES

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

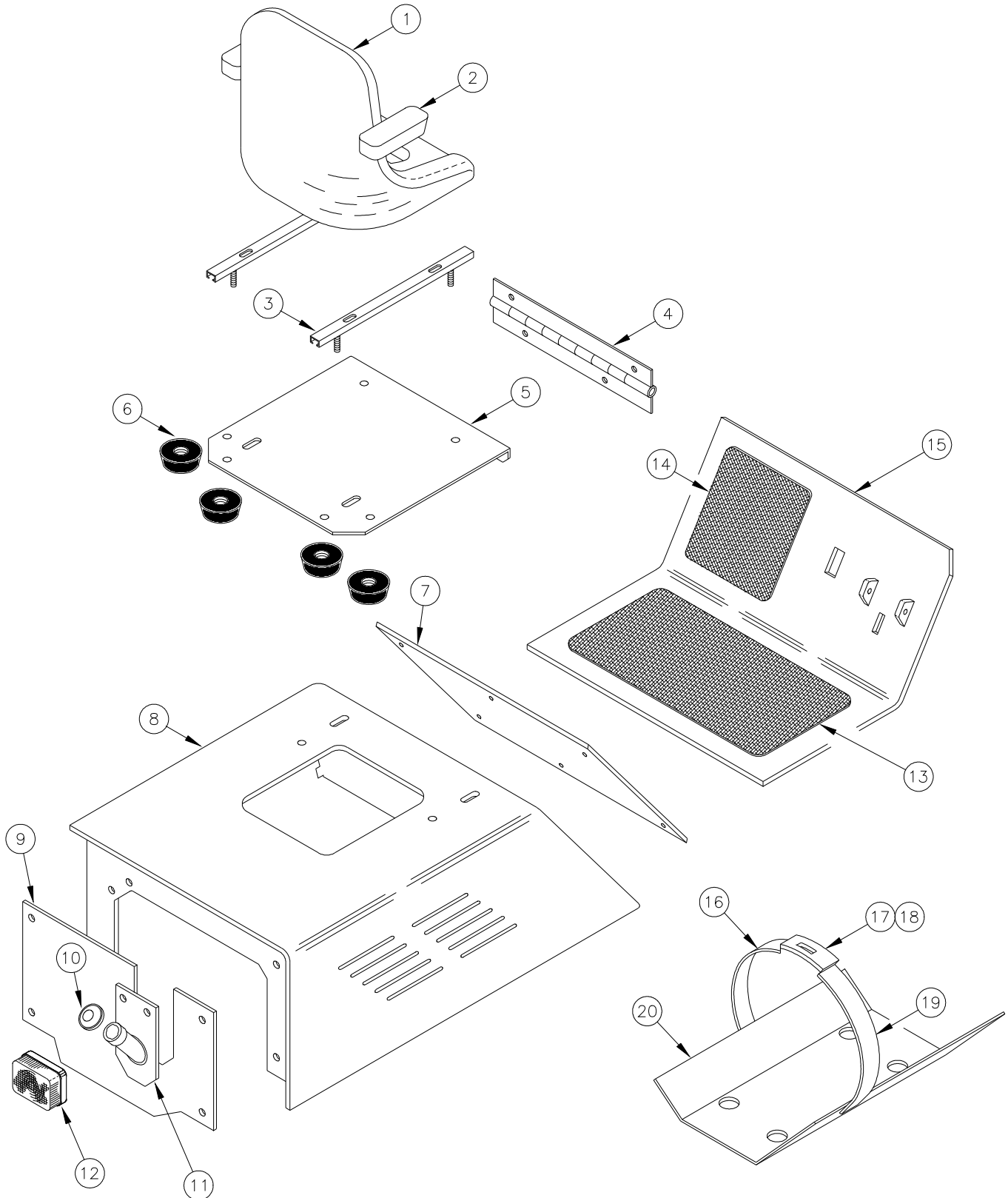
CONSOLE ASSEMBLY (CONTINUED)



CONSOLE ASSEMBLY (CONTINUED)					
ITEM	PART NO.			REQ'D	DESCRIPTION
	GAS	LP	DSL		
29	3400084			1	NUT-WING 1/2-13
30	3400087			4	WASHER-FLAT 3/8 STANDARD
31	3400091			1	WASHER-FENDER 1/2 ZP
32	3400113			2	PIN-CLEVIS 3/8x5-1/2 ZP
33	3400125			4	PIN-COTTER 3/8 RUE-RING
34	3400185			2	PIN-CLEVIS 5/16x1-1/4
35	3500118			1'	EDGING-VINYL TRIM 1/8" (PER FOOT)
36	3307554			1	COVER BROOM ADJ.
37	3335003			1	WELD-CONSOLE, DRIVER SIDE,
-	3334982	3334982	N/A	1	DECAL-CONSOLE, 10X
-	N/A	N/A	3335602	1	DECAL-CONSOLE, 10X DIESEL
-	3335635	3335635	N/A	1	CONSOLE SUB(INCLUDES 2-8,12-14,16,19-23,25,26,28,30 & 32-37)
-	N/A	N/A	3335689	1	CONSOLE SUB(INCLUDES 2-8,12-14,19-23,25,26,28,30,32-34,36,37)

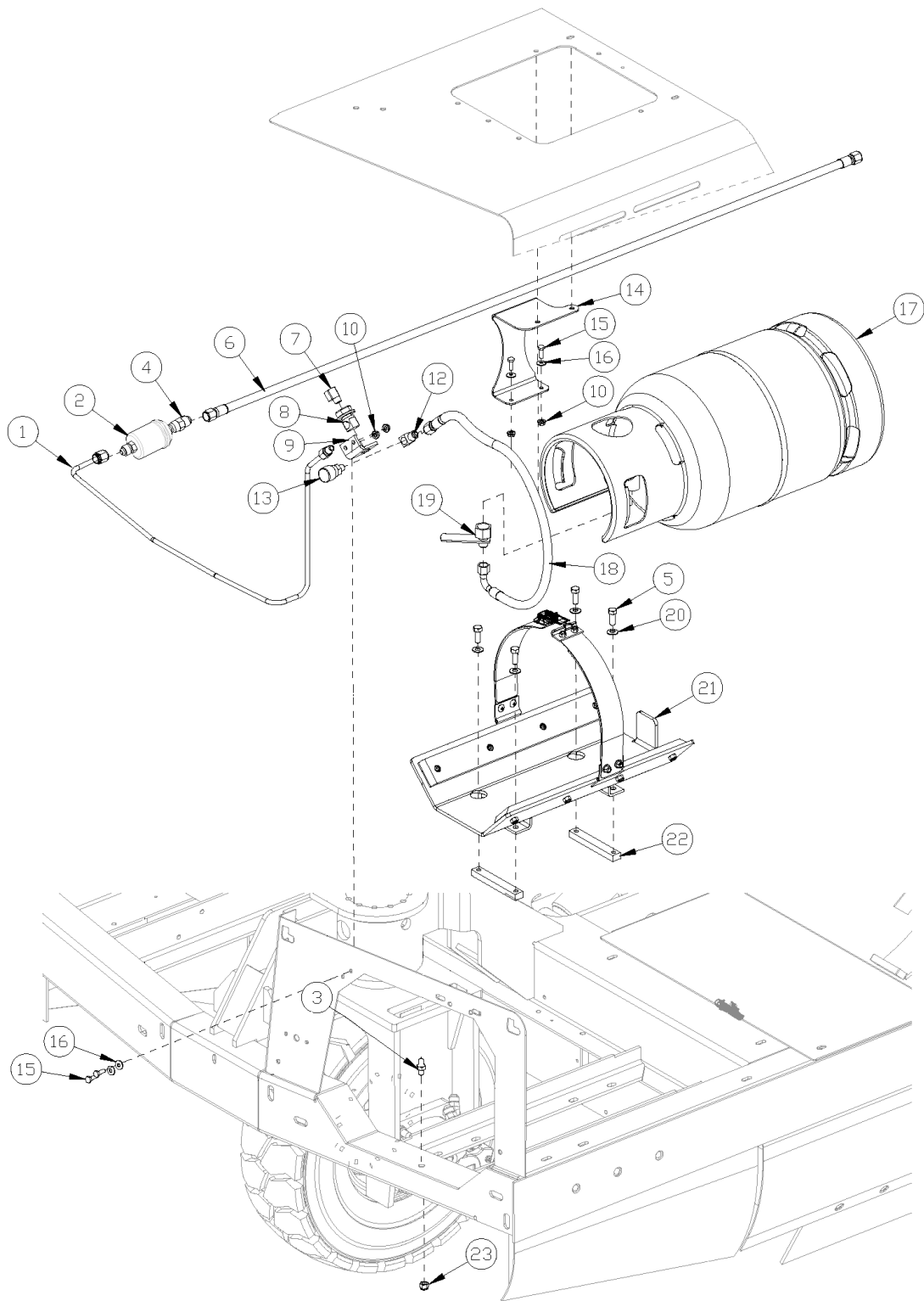
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

SEAT, FLOOR PAN & TAIL LIGHT



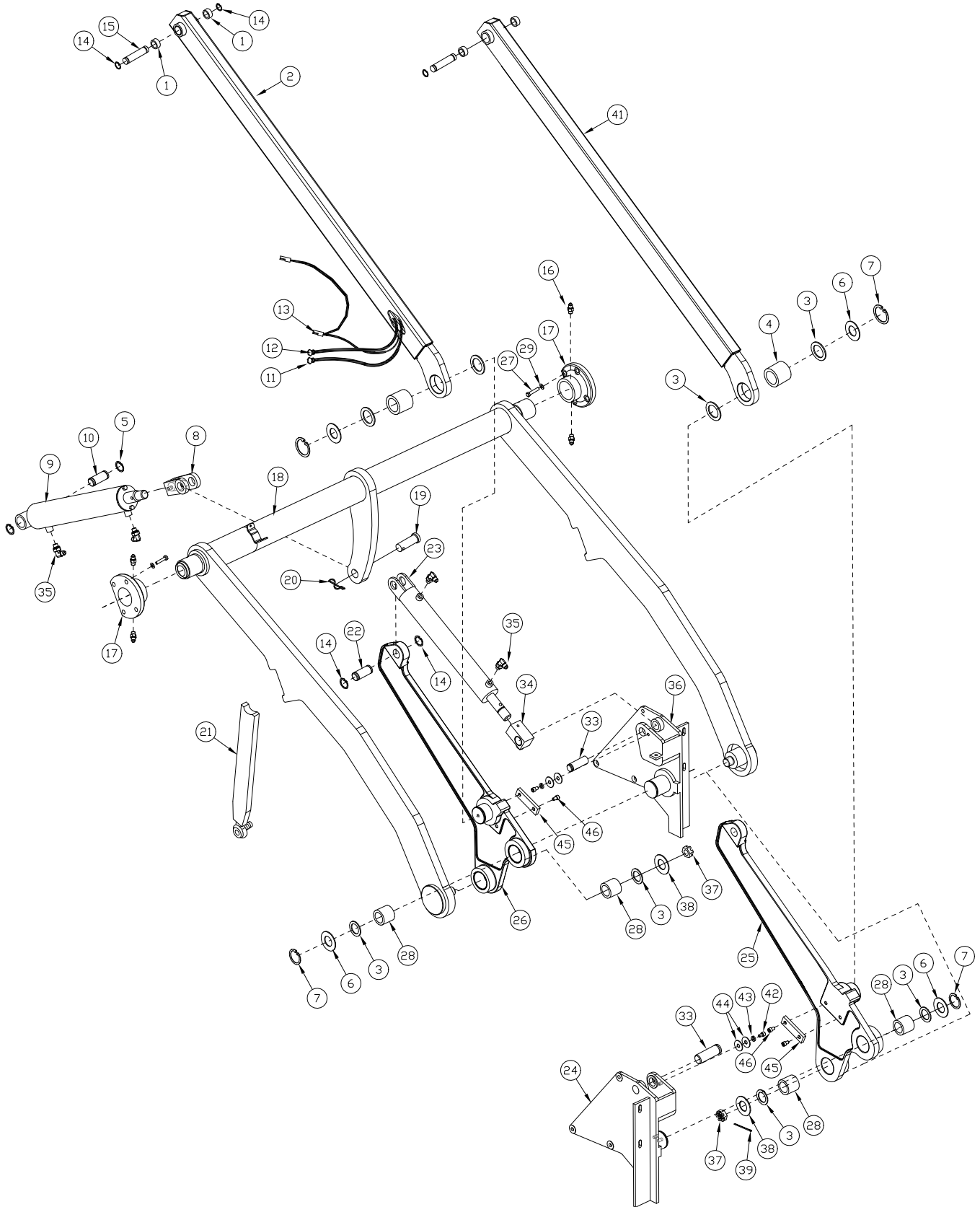
SEAT, FLOOR PAN & TAIL LIGHT			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3312417	1	ASSEMBLY-SEAT V818 ADJ. W/ARMREST
2	3315245	1	ARMREST KIT-THREE HOLE
3	3316891	1	KIT-ADJUSTABLE SEAT TRACK
5	3333729	1	MOUNT-SEAT
6	3302482	4	BUMPER-RUBBER, 1.5" DIA, 5/8 THK
7	3333733	1	WELDMENT-ACCESS PLATE SEAT CLIP
8	3335027	1	WELDMENT-SEAT CLIP
9	3309716	1	PANEL-REAR COVER (NOT USED ON LP)
10	3343413	1	CAP- FUEL TANK W/TETHER (NOT USED ON LP)
11	3335386	1	WELD-FUEL FILL (NOT USED ON LP)
12	3303204	2	LIGHT-COMBINATION TAIL, 12V
13	3307588	1	FLOOR MAT-LARGE
14	3307587	1	FLOOR MAT-SMALL
15	3337387	1	FLOOR BOARD - UPPER, ARMADILLO
	3337388	1	FLOOR BOARD - LOWER, ARMADILLO
16	3334346	1	STRAP-LATCH MNT SW/A LP TANK
17	281075	1	LATCH-ZP
18	3334347	1	MNT-LP LATCH KEEPER
19	3334345	1	STRAP-CATCH MNT SW/A LP TANK
20	3334344	1	MNT-LPG TANK PNTD
-	3307912	1	ASSY- TANK MOUNT (INCLUDES 16-20)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

LP TANK HOSES AND FITTINGS



LP TANK HOSES AND FITTINGS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3335376	1	HOSE - 5/16 LP 90.0 SAE 45 ST#6 ST#6
2	3336584	1	FILTER-LPG FUEL
3	3307930	1	PIN-LPG TANK PLTD
4	3401025	1	FTG-LP FILTER 46 X 6
5	3400030	4	SCR-HEX,3/8-16X1.00 ZP
6	3343734	1	HOSE-3/8 AR 24.0 JIC 45 ST#6 ST#6
7	3334037	1	FTG-MALE ELBOW 49 X 6
8	3316511	1	FITTING, BULKHEAD ASSEMBLY
9	3307934	1	MNT-LPG SAFETY VALVE PNTD
10	3400063	4	NUT-FLANGE LOCK 1/4-20 ZP
11	BLANK	-	NOT USED
12	3334037	2	FTG-MALE ELBOW 49 X 6
13	3400862	1	VALVE-LP RELIEF
14	3307915	1	MNT-LP FILL TUBE PNTD
15	3400042	4	SCR-HEX,1/4-20X0.75 ZP
16	3400383	4	WASHER-CONICAL SPRING 1/4
17	3302649	1	TANK-LP 33 LBS.
18	3335375	1	HOSE - 5/16 LP 28.5 SAE 45 ST#6 ST#6
19	3400860	1	FTG-LP TANK CONNECT
20	3400385	4	WASHER-CONICAL SPRING 3/8
21	3307912	1	ASSY- TANK MOUNT LPG PNTD
22	3307931	2	RETAINER-LP TANK MNT
23	3400394	1	NUT-FLANGE LOCK 7/16-14
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

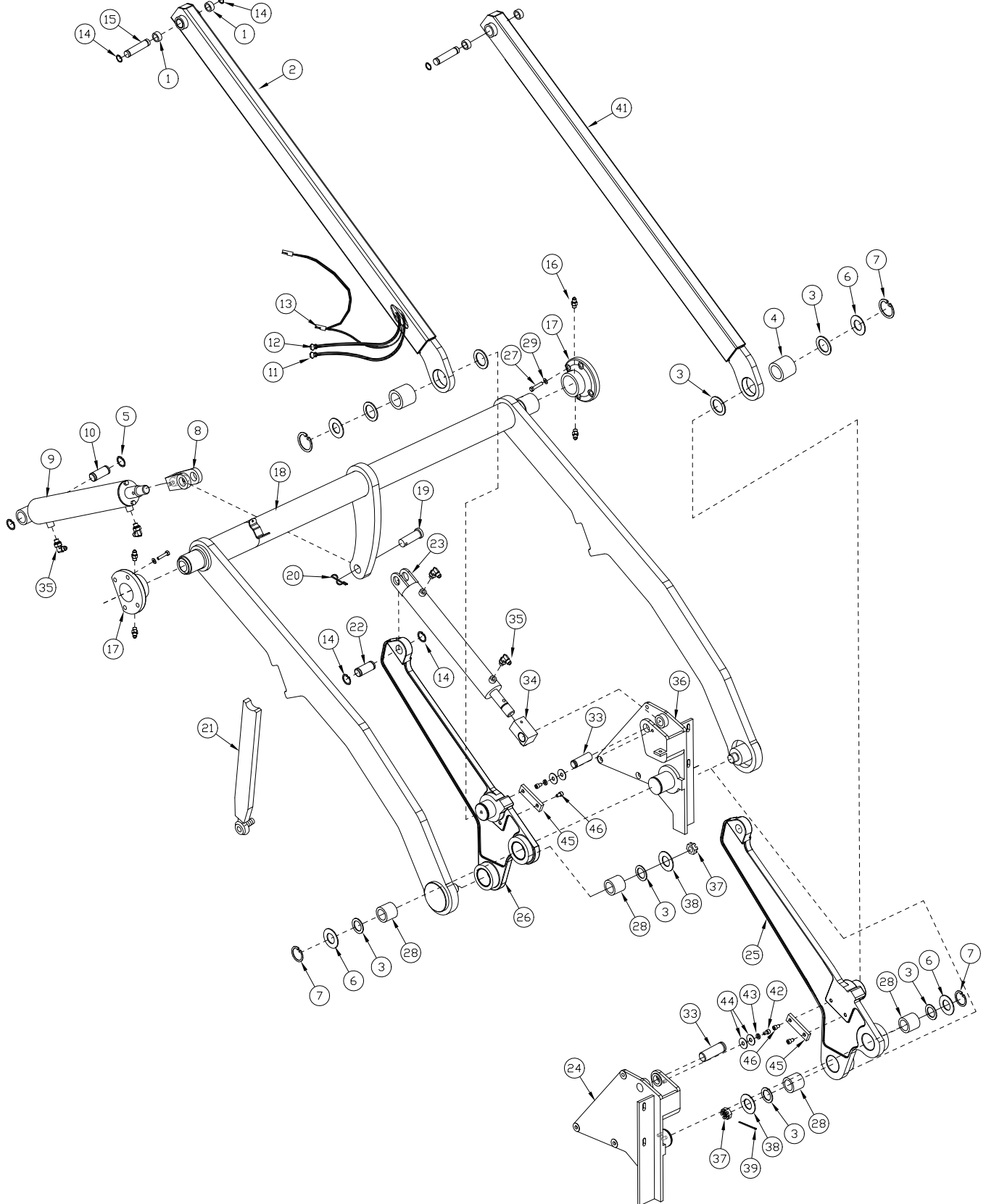
LIFT & ROTATION CYLINDERS, HYDRAULIC HOSES



LIFT & ROTATION CYLINDERS, HYDRAULIC HOSES			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300837	4	BEARING-1.12 ODx1.00 IDx.75
2	3335668	1	ASSY- SECONDARY ARM, RH 10X (INCLUDES BEARINGS AND HOSES)
	3334551	1	LIFT ARM-UPPER RH 10X (ARM ONLY)
3	3400177	10	BEARING-THRUST 2.06 IDx3.25 OD
4	3300836	2	BEARING-2.18 ODx2.00 IDx.75
5	3307431	2	RING-RETAINING EXT LIFT CYL
6	3300882	6	WASHER-HD 3.25 ODx2.00 ID
7	3301709	4	RING-RETAINING, EXT 2.00 DIA
8	3301370	1	CLEVIS-HYD CYL PNTD
9	3307243	1	CYLINDER-HYD HOPPER LIFT
10	3307408	1	PIN-LOWER LIFT CYLINDER,
11	3350226	1	HOSE-HYD, 1/4 AR 98.00 ST#5 90S#4
12	3350225	1	HOSE-HYD, 1/4 AR 108.00 ST#5 90S#4
13	3336963	1	HARNESS-WIRING LIFT
14	3301998	8	RING-RETAINING, EXT .940 DIA
15	3307430	2	PIN-UPPER LIFT ARM, .998 DIA,
16	3400012	4	FTG-GREASE 3/16
17	3307605	2	ASSEMBLY-DUMP ARM MOUNT
18	3350103	1	WELDMENT-HOPPER LIFT ARM
19	3400107	1	PIN-CLEVIS 1.00 DIAx2-5/8 LG,
20	3400121	1	PIN-COTTER 5/32 DIAx2.00 LG,
21	3343821	1	ASSEMBLY-SAFETY ARM W/BALL JOINT
22	3307607	2	PIN-ROTATION CYL, .998 DIA,
23	3307323	2	CYLINDER-ROTATION SW/A PNTD
24	3335361	1	PIVOT-HOPPER LH
25	3335363	1	ASSY- CYLINDER MOUNT LH (INCLUDES BEARINGS)
	3335362	1	LIFT ARM ROTATION LH 10X
26	3307074	1	ASSY- HYDRAULIC CYL MNT,RH 10X (INCLUDES BEARINGS)
	3317366	1	LIFT ARM ROTATION RH 10X
27	3401650	8	SCR-SOC ZP
28	3300840	6	BEARING-2.18 ODx2.00 IDx1.50
29	3401570-11	8	WASHER-NORD-LOCK ZP
30	BLANK	-	NOT USED

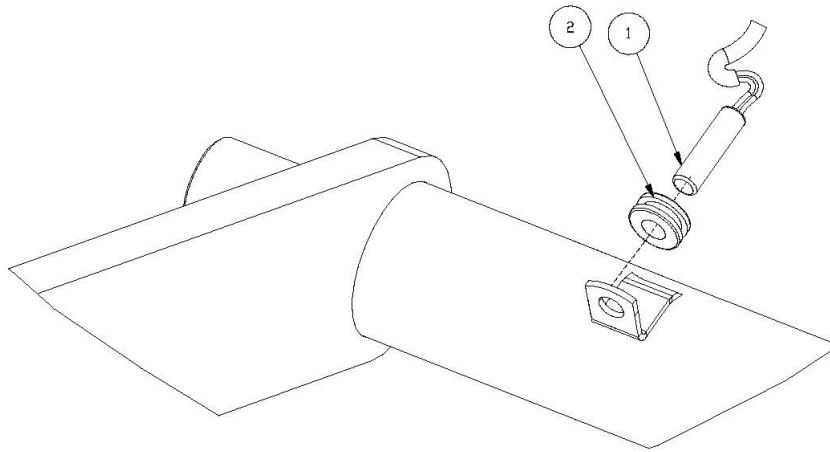
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

LIFT & ROTATION CYLINDERS, HYDRAULIC HOSES (CONTINUED)



LIFT & ROTATION CYLINDERS, HYDRAULIC HOSES (CONTINUED)			
ITEM	PART NO.	REQ'D	DESCRIPTION
31	BLANK	-	NOT USED
32	BLANK	-	NOT USED
33	3307606	2	PIN-FRONT ROTATION CYL, .998 DIA,
34	3317119	1	ASSY- BLOCK ROTATION RH 10X
	3317124	1	ASSY- BLOCK ROTATION LH 10X
35	3400152	6	FTG-90 1/2-20 TO #5
36	3317364	1	PIVOT-HOPPER RH
37	3400076	2	NUT-HEX JAM SLOTTED, 1-14
38	3300879	2	WASHER-HD 3.25 ODx1.00 ID
39	3400122	2	PIN-COTTER 1/8 X 2.00 ZP
40	BLANK	-	NOT USED
41	3334553	1	ASSY- SECONDARY ARM, LH 10X (INCLUDES BEARINGS AND HOSES)
	3334454	1	LH SECONDARY ARM ONLY (NO BEARINGS)
	3350224	1	HOSE-.25 AR 132" ST#5(S) ST#4(S) (NOT SHOWN)
	3350227	1	HOSE-.25 AR 115" ST#5(S) ST#4(S) (NOT SHOWN)
42	3400219	2	SCR-SOC,5/16-18X0.50 ZP
43	3400102	2	WASHER-LOCK 5/16 SPLIT ZP
44	3400278	4	WASHER-FENDER 3/8 ZP
45	3336580	2	STOP-ROTATE CYL
46	3400030	4	SCR-HEX ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

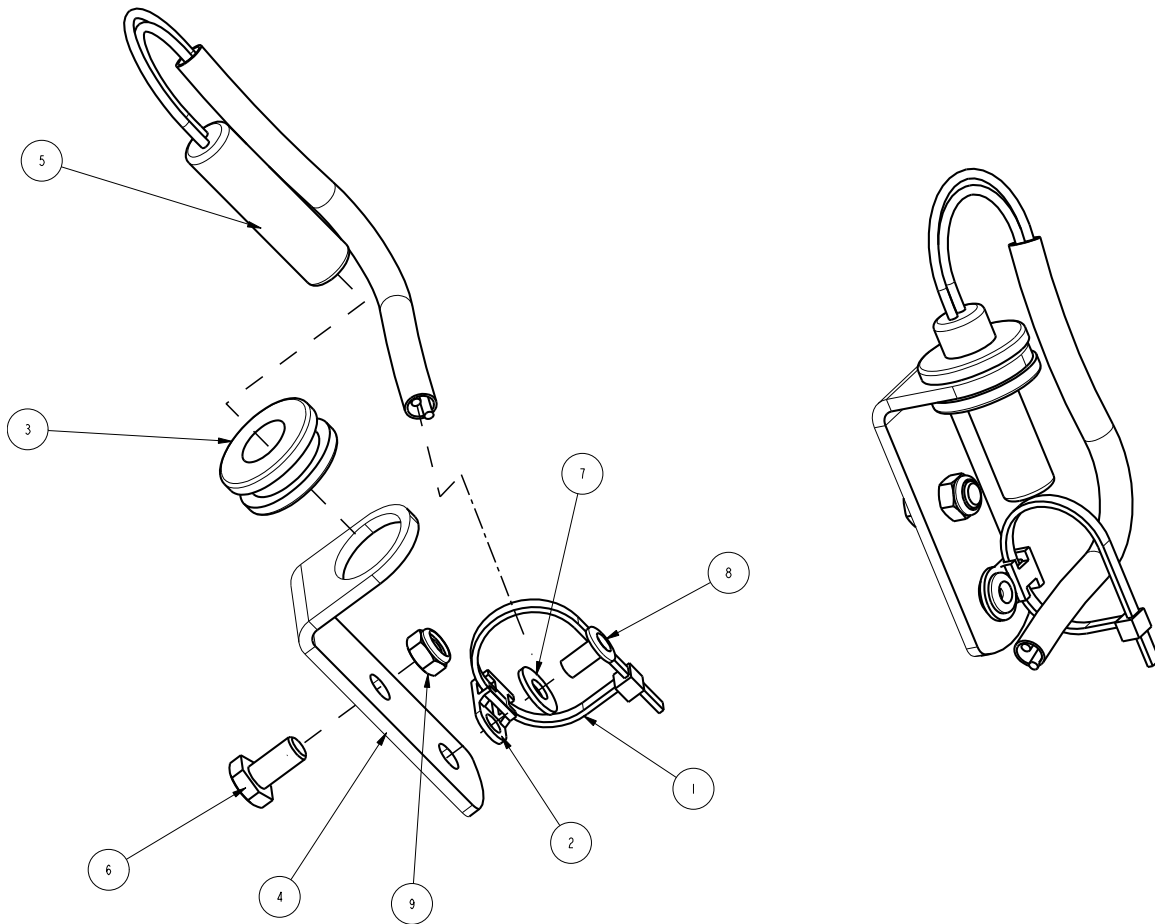
RTR SWITCH DETAIL - LIFT ARM



RTR SWITCH DETAIL - LIFT ARM			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3336963	1	TIE-WIRE BLACK 8.00 IN.
2	3311564	1	GROMMET-RUBBER, 1/2 ID

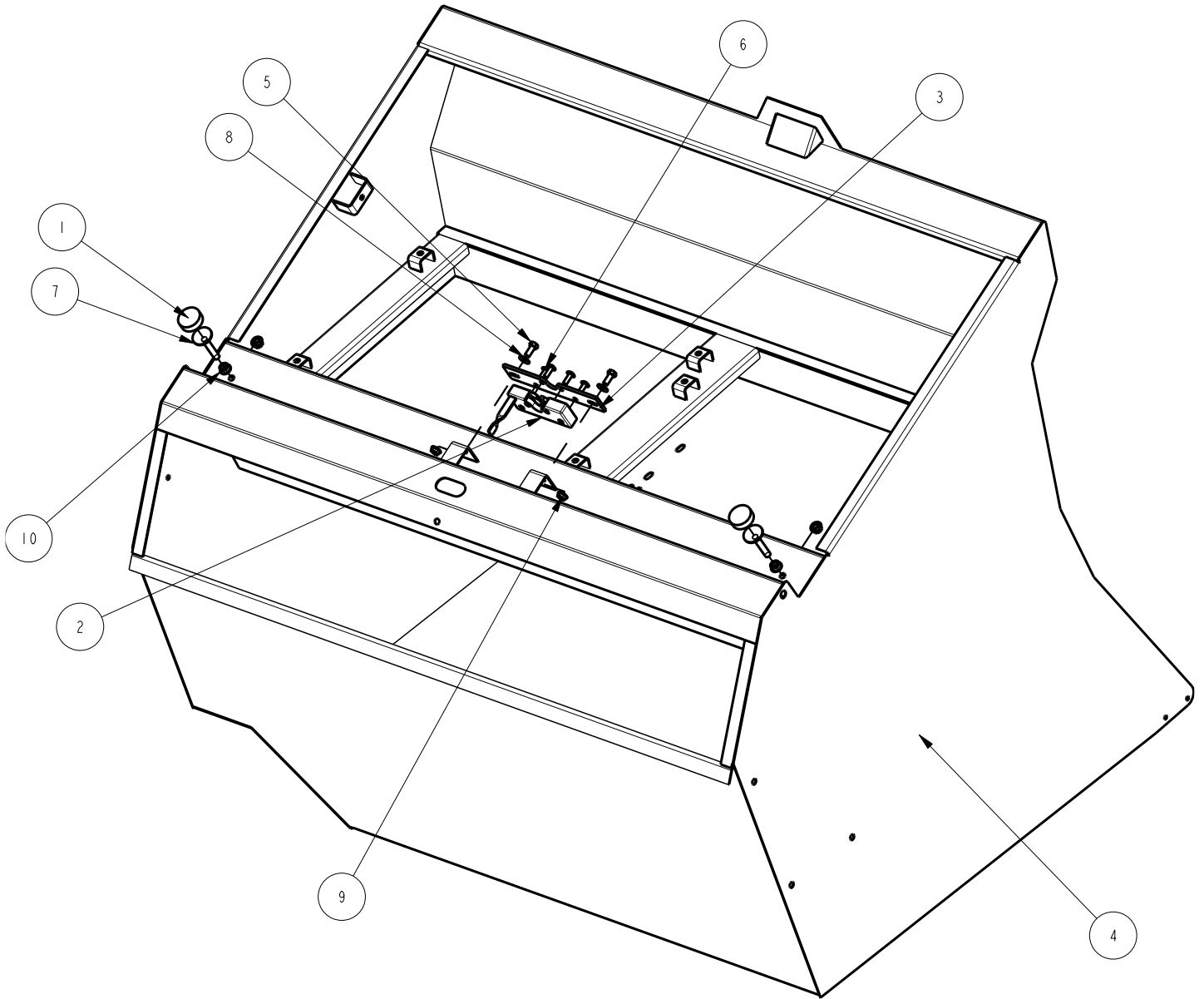
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

RTR SWITCH DETAIL - HOPPER



RTR SWITCH DETAIL - HOPPER			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3302493	1	TIE-WIRE BLACK 8.00 IN.
2	3302472	1	MOUNT-WIRE TIE LOW PROFILE
3	3311564	1	GROMMET-RUBBER, 1/2 ID
4	3336778	1	BRACKET - UPPER SWITCH MOUNT
5	3336964	1	HARNESS - HOPPER, ARMA
6	3400043	1	SCR-HH 1/4-20 X .50 ZINC
7	3400095	1	WASHER-FLAT #10
8	3400484	1	RIVET-AVDEL 3/16 X .602
9	3401569	1	NUT-HEX JAM 1/4-20 ES
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

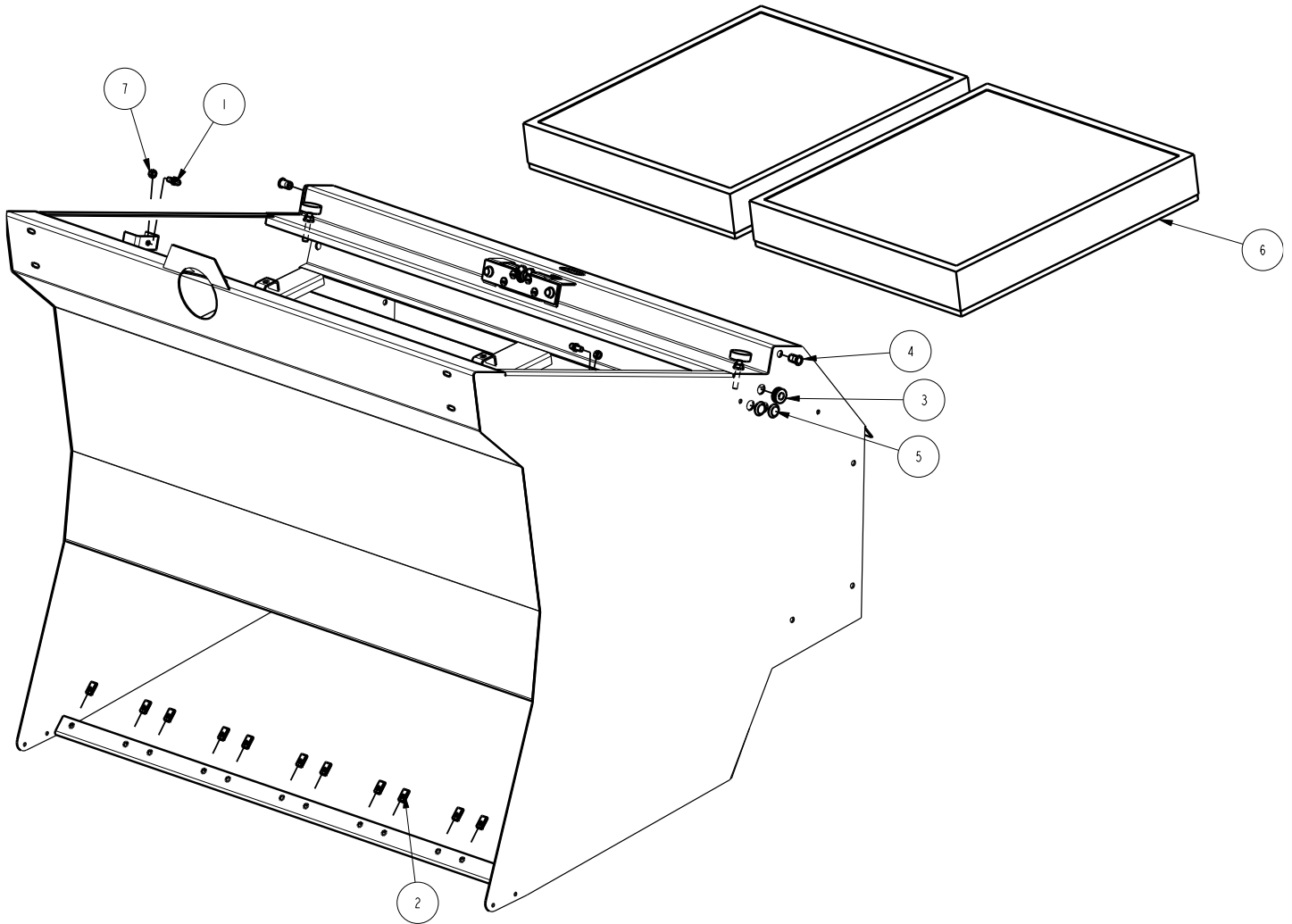
HOPPER LATCH SYSTEM



HOPPER LATCH SYSTEM			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3304624	2	BUMPER-RUBBER CAP
2	3307247	1	LATCH-ROTARY
3	3307468	1	BAR-FILTER LATCH, ZP, SW/A
4	3316986	1	HOPPER 10X ORANGE
5	3400036	2	BOLT-HH 5/16-18X3/4
6	3400059	4	SCR-THM 1/4-20 X 0.75 TRUSS SLOTTED SS
7	3400355	2	LEVELER-3/8-16 X 2 1/2
8	3400384	2	WASHER CONICAL SPRING 5/16
9	3400390	2	NUT-FLANGE LOCK 5/16-18
10	3400392	4	NUT-FLANGE LOCK 3/8-16

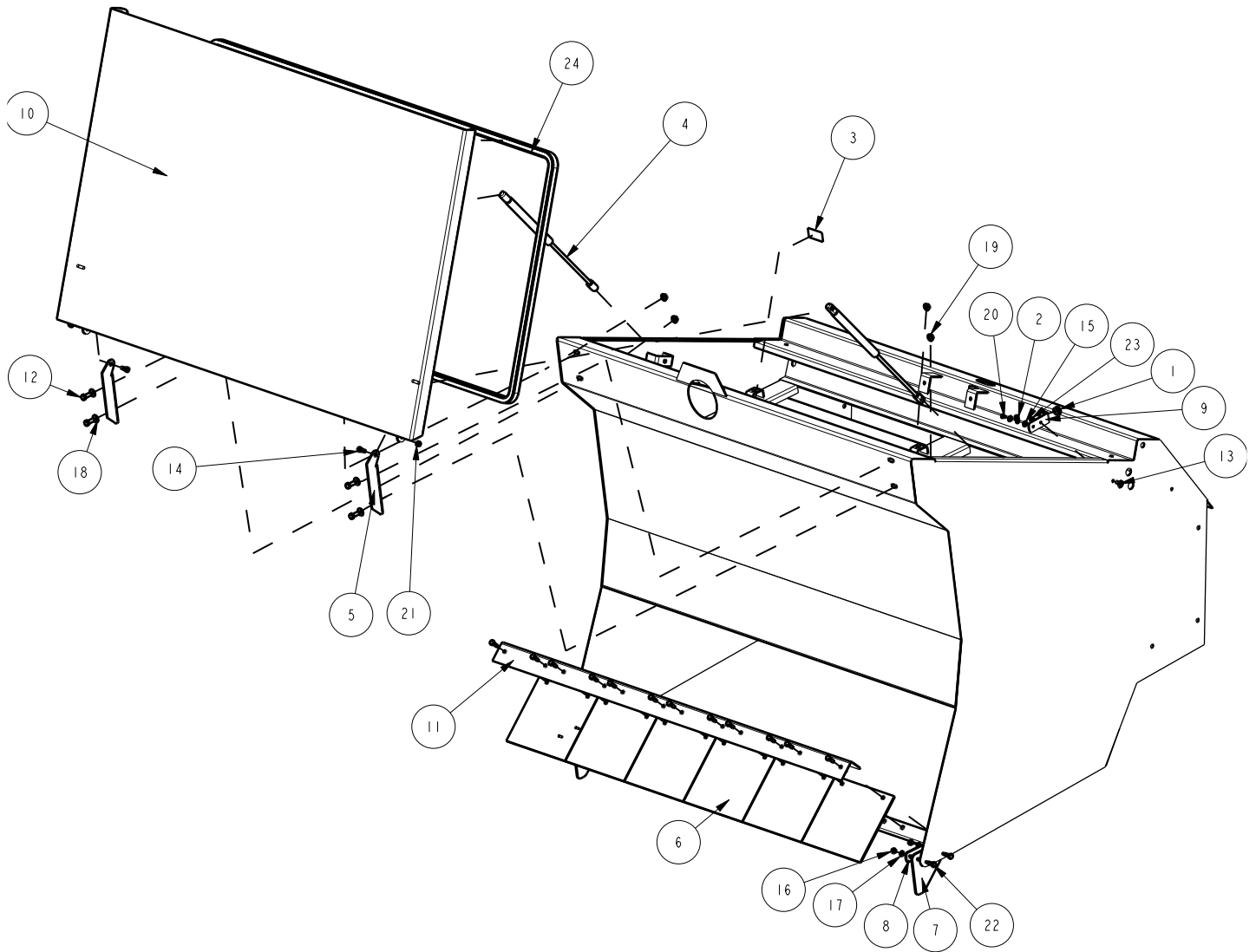
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

HOPPER FILTERS



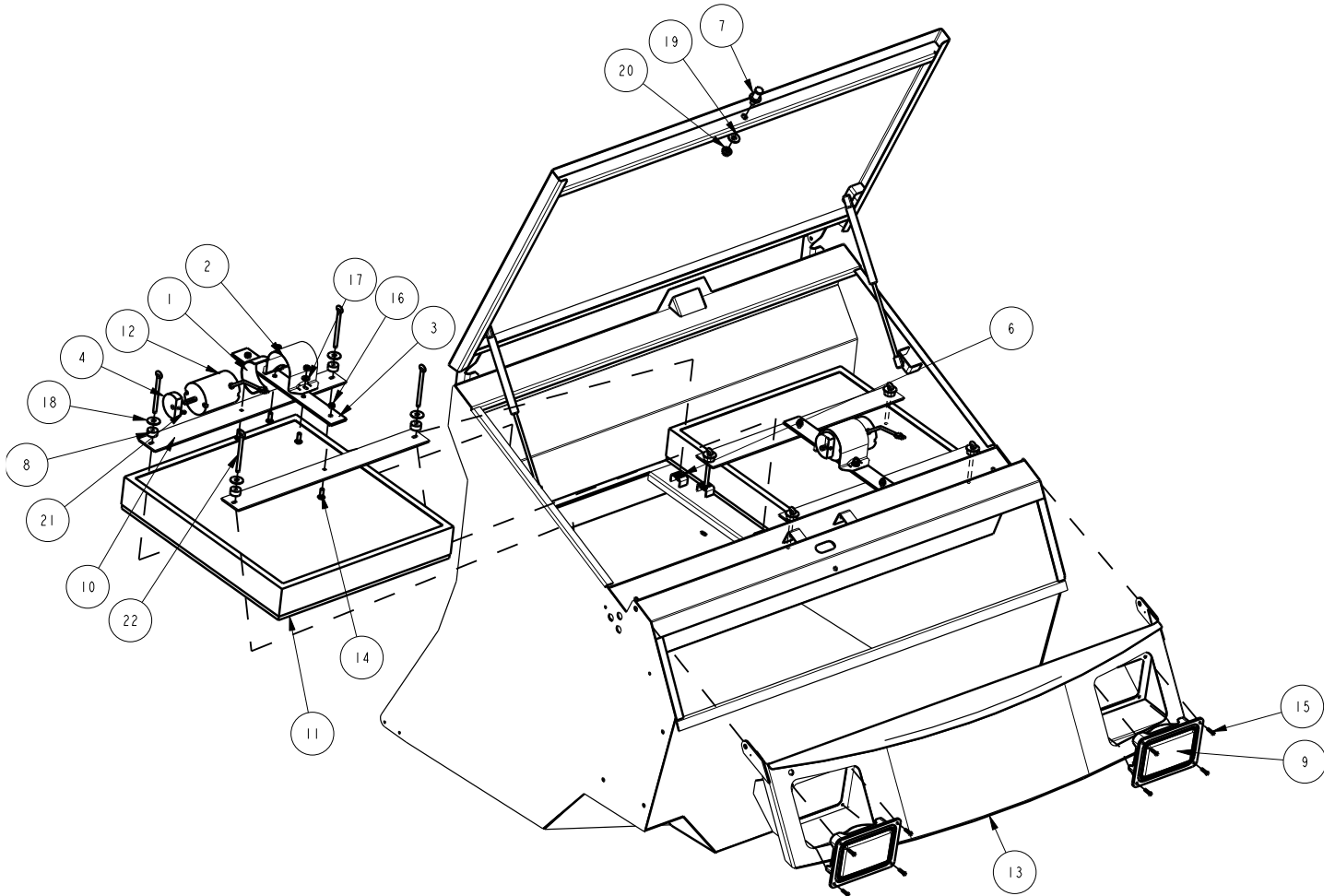
HOPPER FILTERS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300376	2	STUD-BALL 10MM
2	3301146	12	CLIPNUT-1/4-20 ZP
3	3311564	1	GROMMET-1/2 ID RUBBER
4	3322186	2	INSERT 3/8-16 X .31 LG ZP
5	3330356	2	PLUG-PLASTIC HOLE, 3/4,7 GA
6	3334164	2	FILTER-POLYESTER HOPPER
7	3400070	2	NUT-HEX 5/16-18 ZP
-	3336964	1	HARNES - HOPPER (NOT SHOWN)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

HOPPER COVERS AND FLAP COMPONENTS



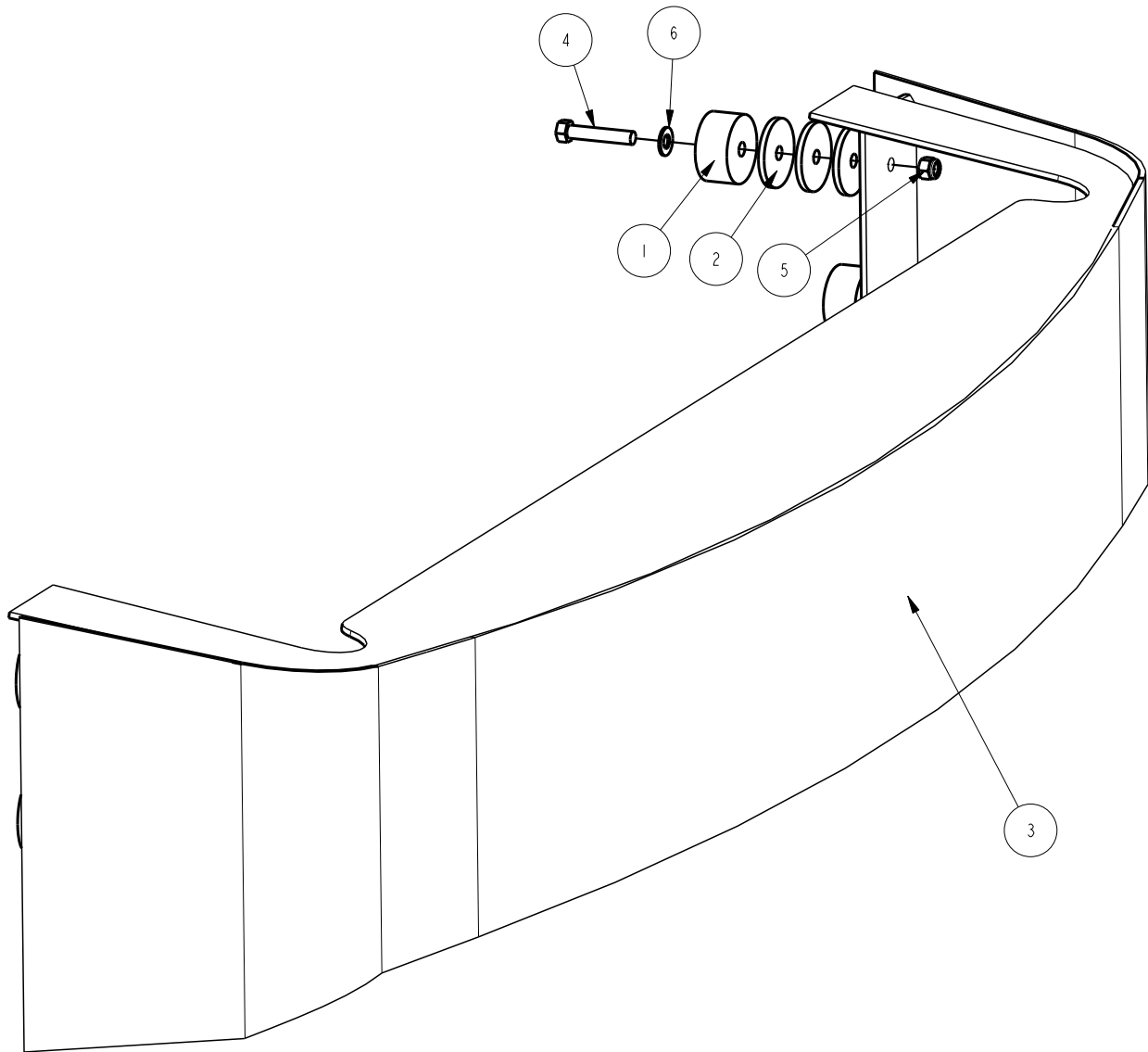
HOPPER COVERS AND FLAP COMPONENTS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3301665	1	GROMMET-INSULATION 3/8ID X 3/4 OD
2	3302472	1	MOUNT-WIRE TIE LOW PROFILE
3	--XXX--	-	NOT SOLD SEPARATELY
4	3305006	2	SPRING-GAS, 14.5", 100LB, 305006
5	3307469	2	HINGE-FILTER COVER
6	3307720	6	FLAP-HOPPER FRONT SW/A
7	3307842	2	FLAP-HOPPER SIDE SW/A
8	3307843	2	RETAINER-FLAP HOPPER SIDE ZP
9	3336778	1	BRACKET - UPPER SWITCH MOUNT
10	3350105	1	HOOD-HOPPER 10X ORANGE
11	3350119	1	RETAINER-HOPPER FLAP SW/10X
12	3400036	4	BOLT-HH 5/16-18X3/4
13	3400043	1	SCR-HEX 1/4-20X.50 ZP
14	3400052	2	SCR-HSS 5/16 DIA X 0.25 BLK OX
15	3400095	2	WASHER .22 ID .50 OD X .049 THK
16	3400198	4	NUT-HEX 1/4-20 ZP
17	3400321	4	WASHER-LOCK 1/4 SPLIT SS
18	3400384	4	WASHER CONICAL SPRING 5/16
19	3400390	4	NUT-FLANGE LOCK 5/16-18
20	3400484	1	RIVET-AVDEL 3/16 X .602
21	3401021	2	NUT-JAM 1/4-20 ZP
22	3401480	16	SCR-HEX, 1/4-20X0.75 SS
23	3401569	1	NUT-HEX JAM 1/4-20 ES ZP
24	3500198	1	SEAL-TRIM 90 DEG. MOUNT
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

HOPPER DUMP DOOR AND FILTER SHAKER COMPONENTS



HOPPER DUMP DOOR AND FILTER SHAKER COMPONENTS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300904	2	MOUNT-NEOPRENE SHAKER MTR
2	3300915	2	RETAINER - SHAKER MOTOR
3	3300917	2	MOUNT-FILTER SHAKER PNTD
4	3301053	2	WEIGHT-SHAKER MOTOR ECCENTRIC, PNTD
5	3305006	2	SPRING-GAS, 14.5", 100LB, 305006
6	3306424	8	CLIPNUT-5/16-18 FULL BODY
7	3307248	1	BOLT-STRIKER BROOM DOOR LATCH
8	3307850	8	ISOLATOR-RUBBER, .25IDx1ODx.50THK, SW/A
9	3315839	2	HEADLIGHT-FLUSH MOUNT HALOGEN
10	3316989	4	BAR-FILTER RET SW/10X
11	3334164	2	FILTER-POLYESTER HOPPER
12	3342894	2	MOTOR-12V SHAKER W/PACKARD CONN.
13	3350265	1	HOPPER DUMP LID ARMA ORANGE
14	3400009	8	SCR-CAR,5/16-18X1.00 ZP
15	3400044	8	SCR-HEX 10-32 X 3/4 ZP
16	3400070	8	NUT-HEX 5/16-18 ZP
17	3400088	4	WASHER 5/16 ID .688 OD X .065 THK
18	3400278	8	WASHER-FENDER 3/8 ZP
19	3400386	1	WASHER-CONICAL SPRING 5/16
20	3400394	1	NUT-FLANGE LOCK 7/16-14
21	3400826	2	SCR-SET 1/4-28 X .25 - CUP PT. SET SCR
22	3400962	8	SCR-THUMB, 5/16-18x4, ZP
-	3315330	1	HARNESS-HEADLIGHTS LOW-DUMP (NOT SHOWN)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

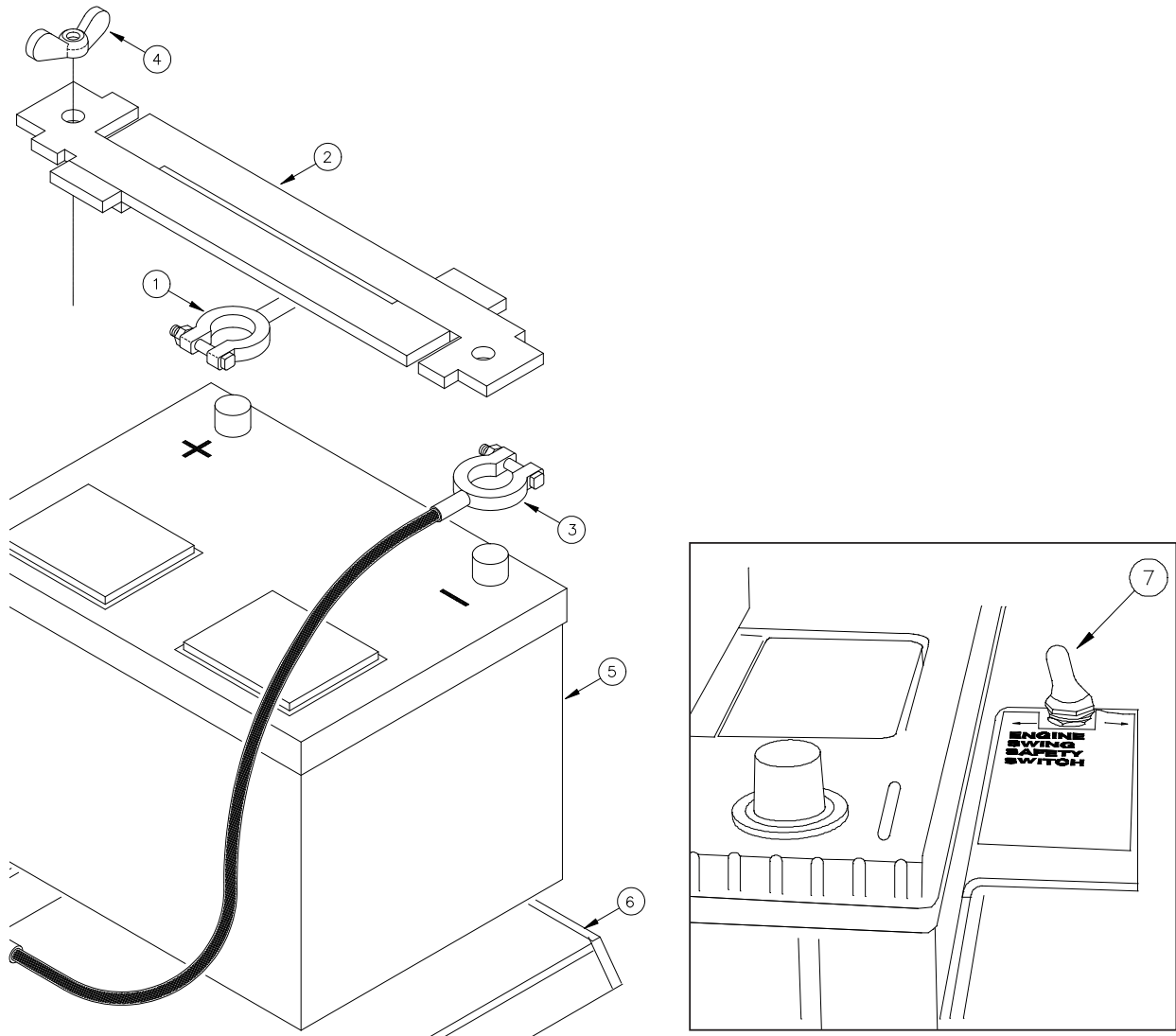
FRONT BUMPER ASSEMBLY



FRONT BUMPER ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300338	4	BUMPER-RUBBER
2	3307818	12	SPACER-SHOCK DISK PLTD
3	3350183	1	FRONT BUMPER 10X
4	3400031	4	SCR-HEX 3/8 -16X2.00 ZP
5	3400079	4	NUT-HEX 3/8-16 ES ZP
6	3400087	4	WASHER 3/8 ID .81 OD X .065 THK
-	3334591	1	BUMPER SUB (INCLUDES 1-6)

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

BATTERY COMPONENTS

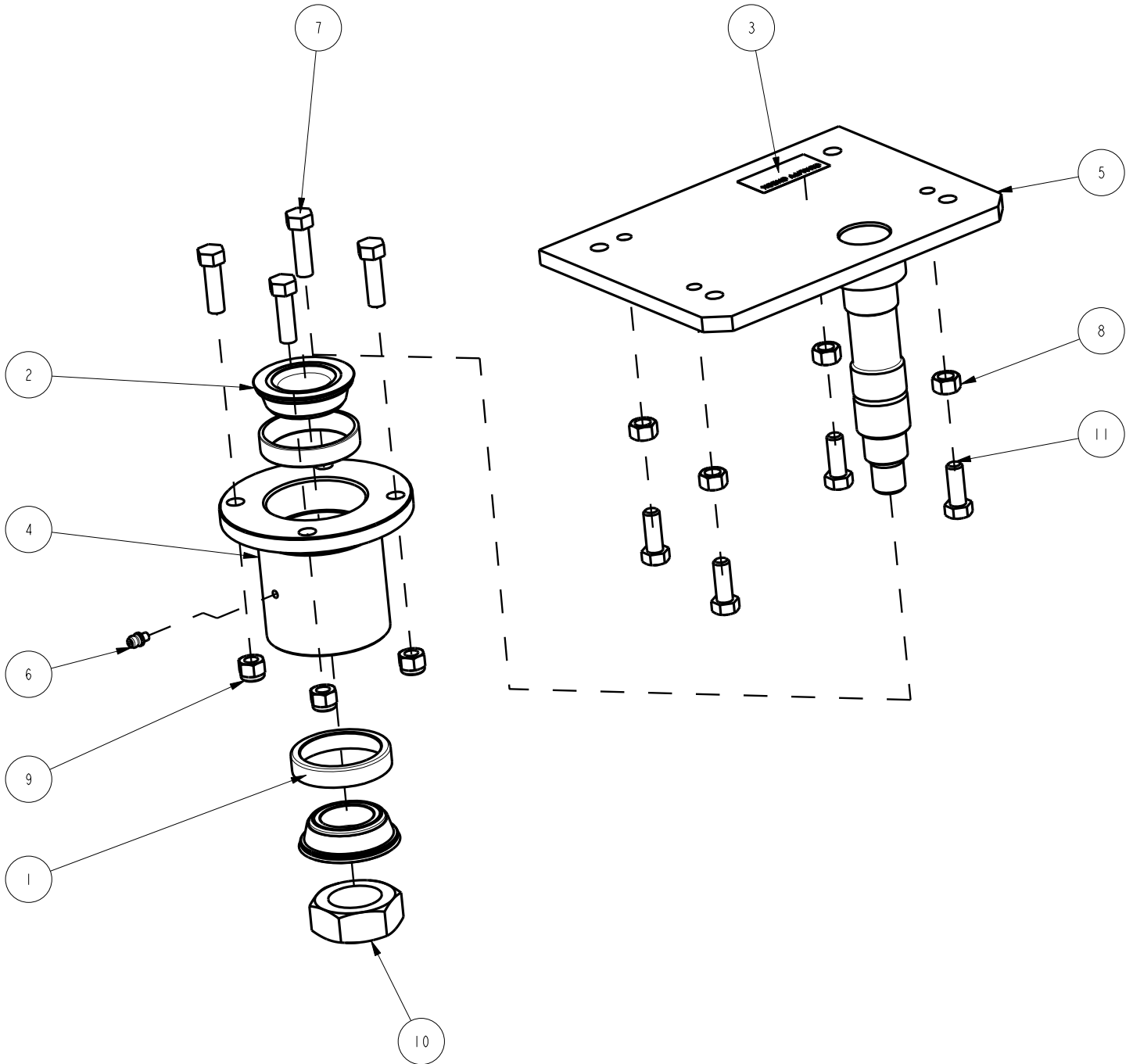


BATTERY COMPONENTS

ITEM	PART NO.	REQ'D	DESCRIPTION
1	3307939	1	CABLE-BATTERY POSITIVE DIESEL ENGINE
	3307633	1	CABLE-BATTERY POSITIVE GAS AND LP ENGINE
2	3301076	1	HOLD DOWN-BATTERY 2-PIECE
3	3307634	1	CABLE BATTERY NEGATIVE
4	3400085	2	NUT-WING 1/4-20
5	3300440	1	BATTERY-GAS/LP/DIESEL, 12V, 650 CCA, 125 MIN. RESERVE
6	3321296	1	WELD-BATTERY BOX
7	3329812	1	SWITCH-TOGGLE SPDT

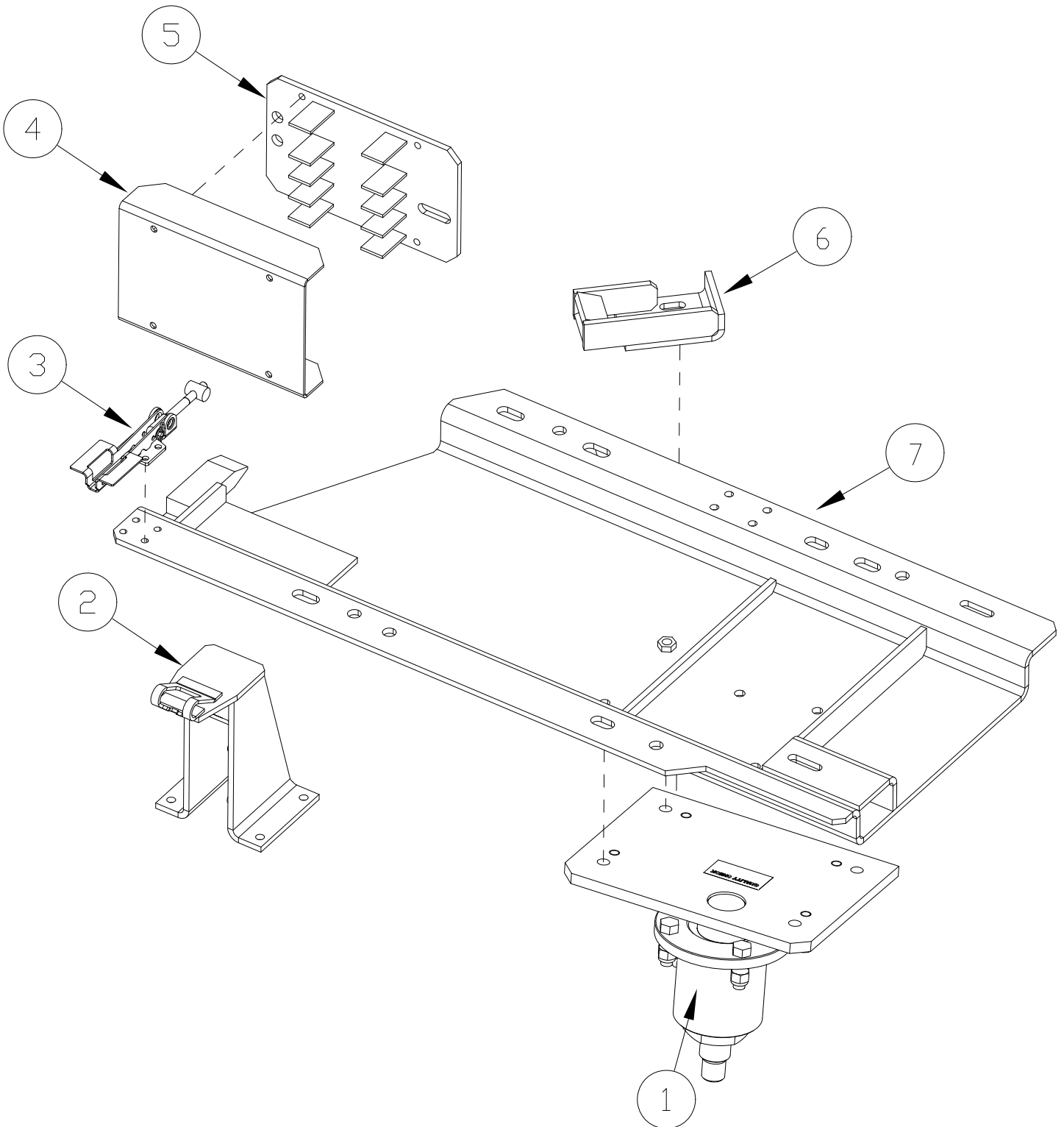
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE PIVOT ASSY



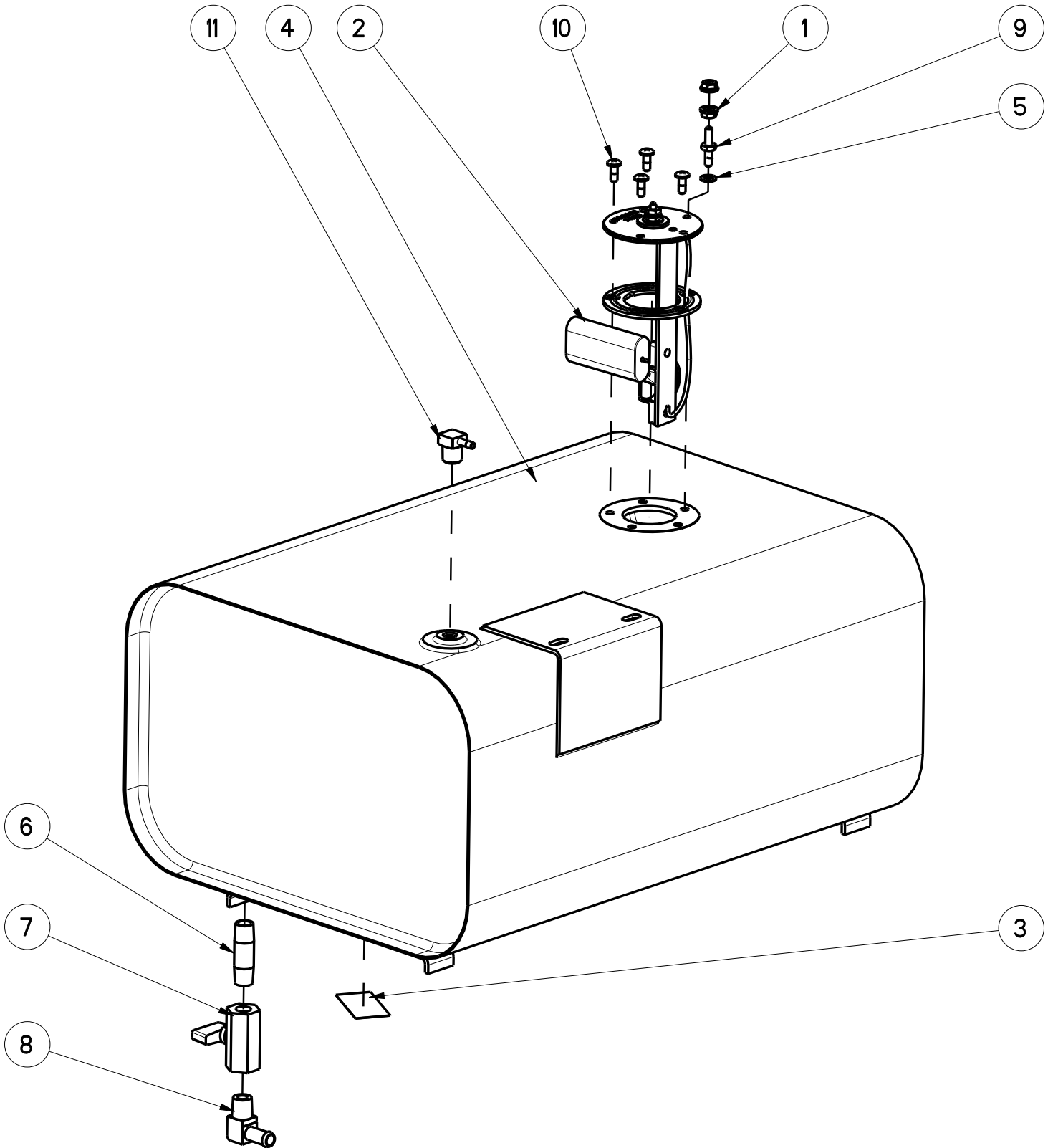
ENGINE PIVOT ASSY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300470	2	BEARING-TAPERED ROL CUP
2	3300471	2	BEARING-TAPERED ROLCONE W/SEAL
3	--XXX--	-	NOT SOLD SEPARATELY
4	3307326	1	BRG MOUNT-ENGINE PIVOT
5	3334951	1	WELD-ENGINE PIVOT, ARMA
6	3400012	1	FTG-GREASE 3/16 DRIVE
7	3400029	4	SCR-HEX 3/8 -16X1.25 ZP
8	3400067	4	NUT-HEX 3/8-24 ZP
9	3400079	4	NUT-HEX 3/8-16 ES ZP
10	3400083	1	NUT-HEX 1 1/4-12 ES ZP
11	3400186	4	SCR-HEX 3/8-24 X 1.0 LG, ZP
-	3335281	1	ASSY-PIVOT SUB (INCLUDES 1-11)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE PAN, HYDRAULIC HOSE RETAINER & LATCH



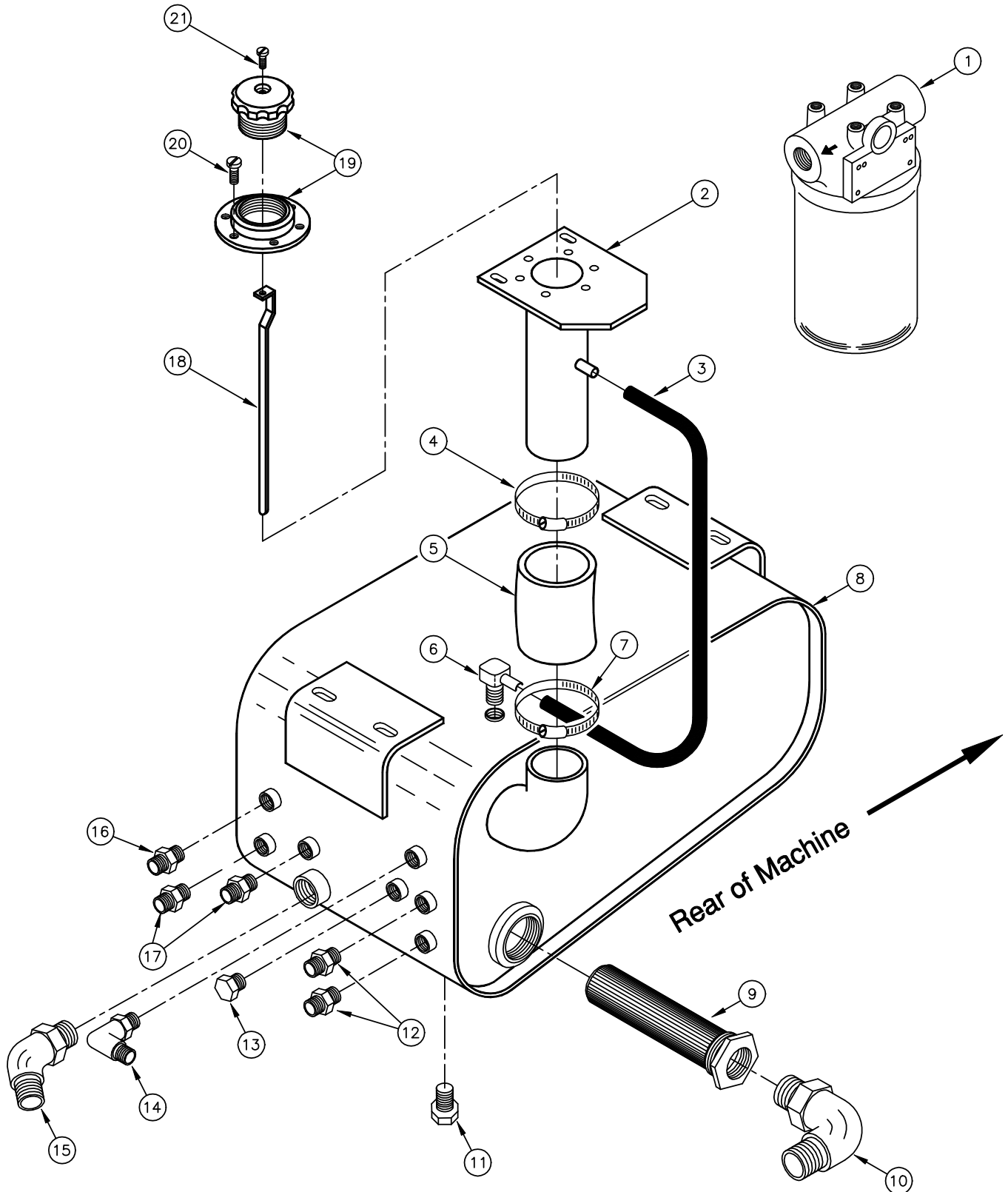
ENGINE PAN, HYDRAULIC HOSE RETAINER & LATCH			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3335281	1	ASSY-PIVOT SUB
2	3335208	1	ENG CATCH OUTER, ARMA
3	3337544	1	LATCH - ENGINE SWING
4	3333303	1	COVER-HOSE RETAINER SHORT PNTD
5	3333302	1	HOSE RETAINER SW/A
6	3335183	1	INNER ENG CATCH, ARMA
7	3334994	1	ENGINE PAN, GM 1.6L
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

FUEL TANK GASOLINE AND DIESEL



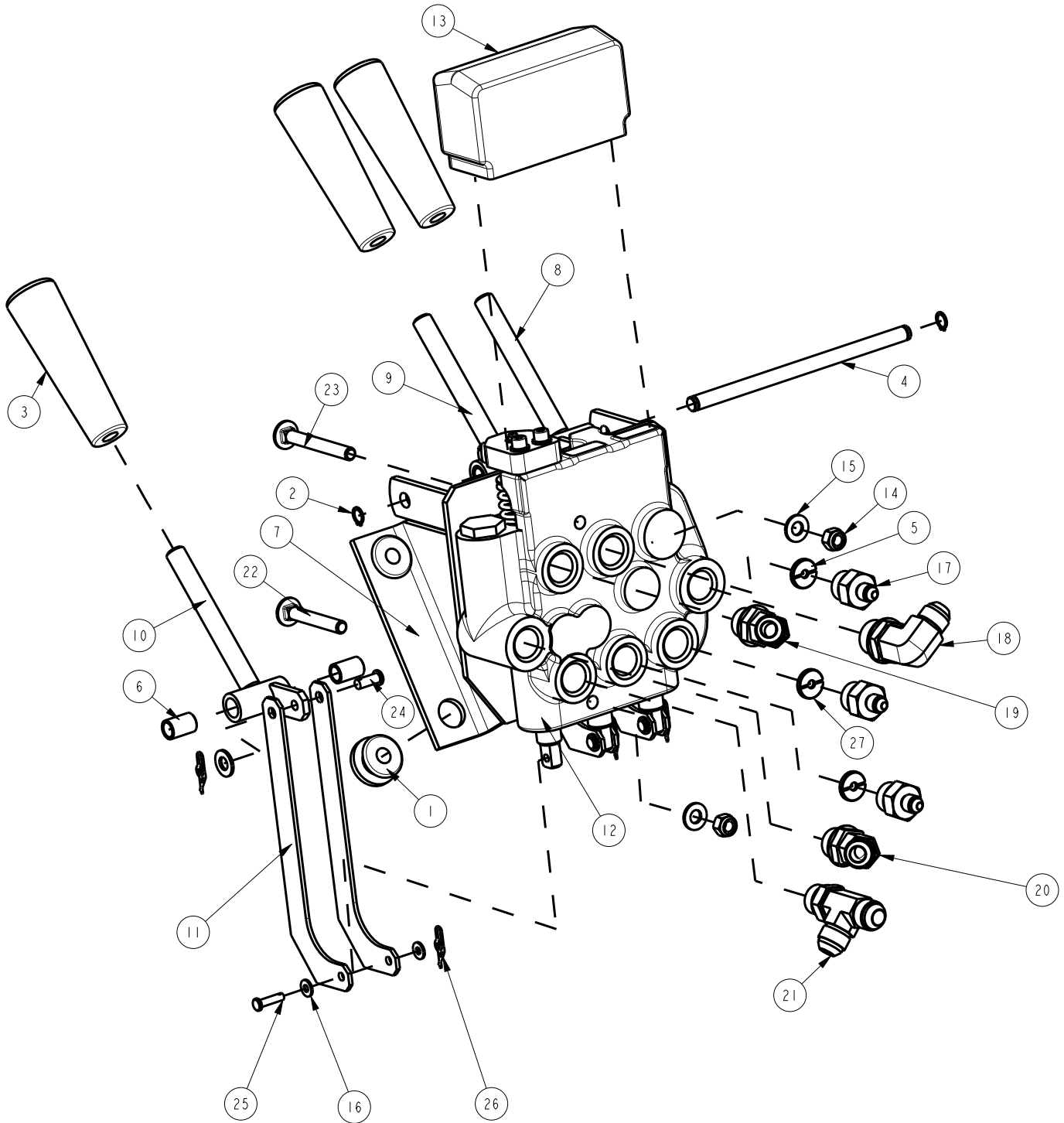
FUEL TANK GASOLINE AND DIESEL					
ITEM	PART NO.			REQ'D	DESCRIPTION
	GAS	LP	DSL		
1	711427	N/A	711427	2	NUT-FLANGED 10-32
2	3300388	N/A	3300388	1	SENDER - FUEL W/ CORK GASKET
3	--XXX--	N/A	--XXX--	1	NOT SOLD SEPARATELY
4	3335055	N/A	3307575	1	ARMA - FUEL TANK
5	3337019	N/A	3337019	1	SEAL - #10 BONDED NITRILE WASHER
6	3400498	N/A	3400498	1	FTG-NIPPLE 1/4 MPT
7	3400499	N/A	3400499	1	VALVE-MINATURE 1/4 FPT BALL
8	3400793	N/A	3400793	1	FTG-90 DEG 3/8 BARB TO 1/4 NPT
9	3401579	N/A	3401579	1	SCR - HEX STANDOFF, 2X 10-32X.50 LG
10	3401579	N/A	3401636	4	SCR - PAN, 10-32 X .50, BUNA O-RING SS
11	3402022	N/A	3402022	1	FTG-90 1/4 MPT X 1/4 HOSE BARB
-	3335272	N/A	3307066	1	FUEL TANK SUB (INCLUDES 1-11)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS					

HYDRAULIC RESERVOIR ASSEMBLY



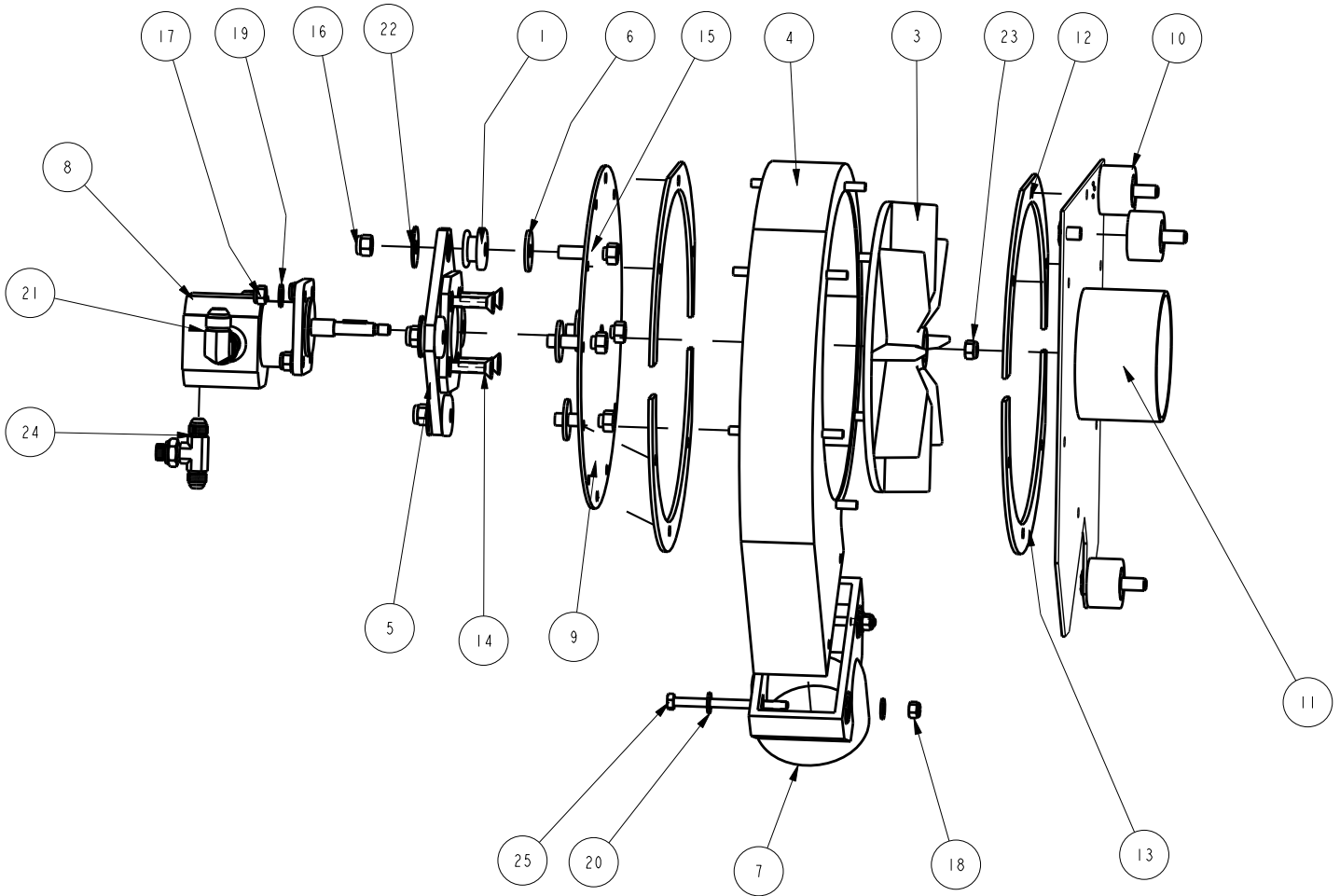
HYDRAULIC RESERVOIR ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3307078	1	ASSY- HYDRAULIC FILTER (INCLUDES NEXT 5 ROWS)
-	3300359	1	FILTER-HYDRUALIC OIL (FILTER ONLY)
-	3300358	1	SUB-HYD FILTER SW/10X (FILTER & MOUNT)
-	3400167	1	FTG-ADAPTER, 1 1/6-12 EXT TO (NOT SHOWN)
-	3400632	1	FTG-ADAPTER, RUN TEE 1-1/16-12 (NOT SHOWN)
-	3400636	1	FTG-ADAPTER, SWIVEL NUT 90° ELBOW (NOT SHOWN)
2	3310072	1	WELDMENT-HYD FILL TUBE
3	3302703	1	HOSE-VACUUM LINE, 1/8
4	3044112	1	CLAMP-HOSE, SS, 2.50 MAX WORM
5	3303577	1	HOSE-RUBBER, 2.00IDx3.50 LG
6	3307778	1	FTG-90° 1/8MPTx1/4 BARB
7	3044112	1	CLAMP-HOSE, SS, 2.50 MAX WORM
8	3335527	1	RESERVOIR-HYDRAULIC, 7.5 US GA
9	3343836	1	STRAINER-HYDRAULIC TM-14
10	3400917	1	FTG-90° DEG MALE ELBOW
11	3400164	1	FTG-PLUG 3/4-16 O RING
12	3304899	2	FTG-ADAPTER 3/4-16 TO 1/2 OD TUBE
13	3400453	1	FTG-PLUG 9/16-18 O-RING STEEL
14	3400152	1	FTG-90° 1/2-20 TO #5
15	3332571	1	FTG-STR THREAD O RING 45° EL
16	3400871	1	FTG-C5315 X 6 X 5
17	3306875	2	FTG-ADAPTOR 1/2-20 TO 5/16 OD
18	3307580	1	DIPSTICK-HYD RESERVOIR
19	3305576	1	ASSEMBLY-HYD OIL FILTER BREATHER
20	3400044	6	SCR-HEX,#10-32X0.75
-	3400172	6	NUT-HEX JAM #10-32 ES ZP (NOT SHOWN)
21	3400045	1	SCR-PAN,#8-32X0.62,SLT
-	3400082	1	NUT-HEX #8-32 ES ZP (NOT SHOWN)
-	3342472	1	ASSY- HYDRAULIC FILL TUBE (INCLUDES 2,4,5,7,18-21,3400172 & 3400082
-	3335773	1	ASSY- HYDRAULIC RESERVOIR (Includes Items 6, 8-17)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

HYDRAULIC CONTROL VALVE ASSEMBLY



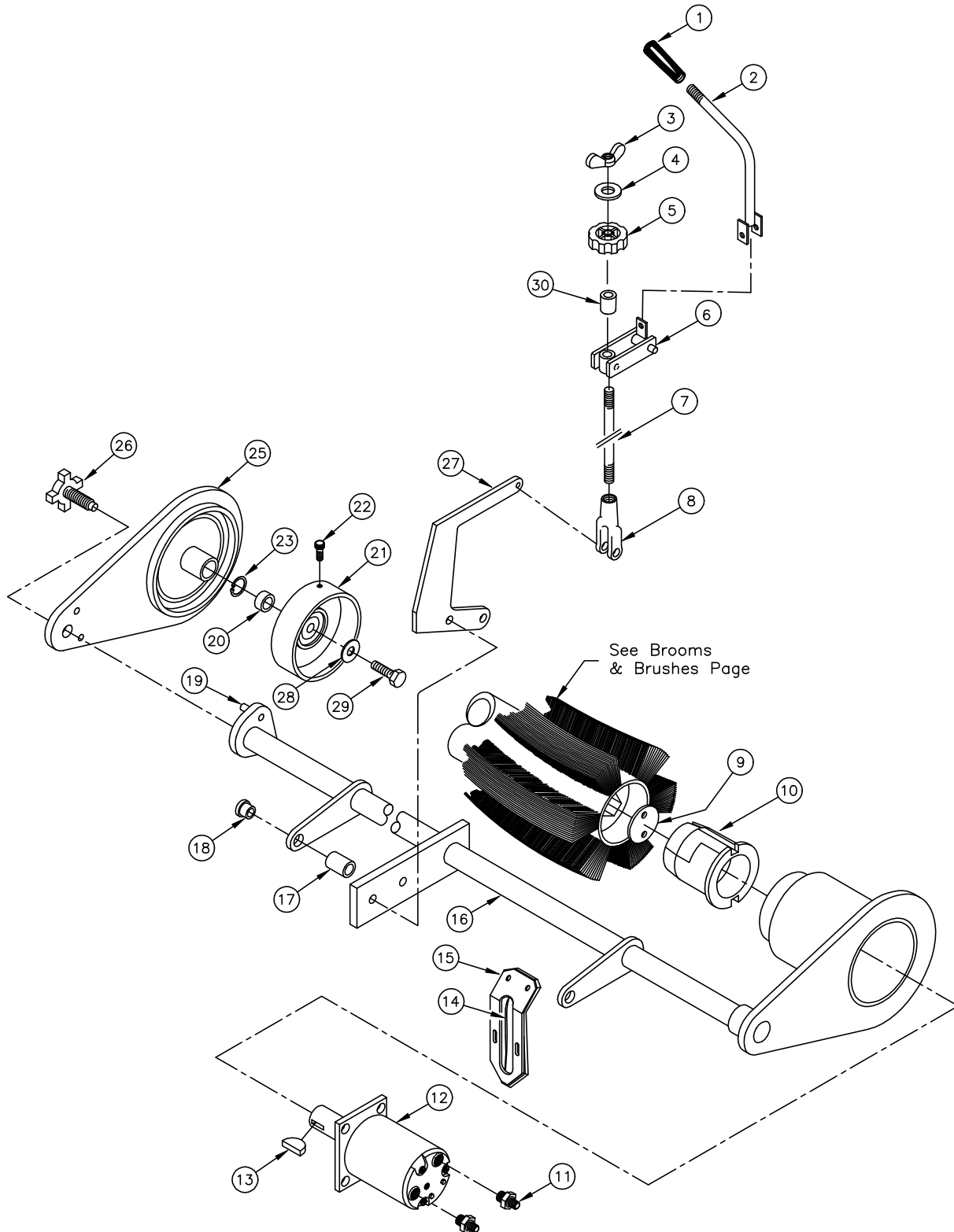
HYDRAULIC CONTROL VALVE ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300465	4	MOUNT-ISO IMP MNT
2	3300548	2	3/8" RETAINING RING
3	3300558	3	KNOB-TAPERED #145 BLACK
4	3300884	1	ROD - PIVOT CONTROL VALVE PLTD
5	3301683	2	ORIFICE - BRASS #334, .043" DIA
6	3303996	6	BEARING - PLASTIC 1/2" O. D. X 3/8" ID X .75 LG
7	3307196	1	ASSY - CONTROL VALVE MNT. SW/A
8	3307201	1	WELD - HANDLE CONT VALVE 1 PLTD
9	3307202	1	WELD - HANDLE CONT VALVE 2 PLTD
10	3307203	1	WELD - HANDLE CONT VALVE 3 PLTD
11	3307206	6	LINK - HYD. VALVE SW/A
12	3307433	1	VALVE - HYD CONTROL 3-SPOOL SW/A
13	3338128	1	VALVE COVER - BLACK VINYL
14	3400080	2	NUT-HEX 5/16-18 ES ZP
15	3400088	5	WASHER 5/16 ID .688 OD X .065 THK
16	3400096	6	WASHER-FLAT #8 ZP
17	3400150	3	FTG-ADAPTER STRAIGHT 4MJIC X 8MORB
18	3400155	1	FTG-90 EL 8JIC X 10MORB
19	3400157	1	FTG-45 3/4-16 TO #8
20	3400158	1	FTG-45 3/4-16 TO #8
21	3400163	1	FTG-TEE OFFSET 3/4-16 TO #8
22	3400368	1	SCR - CAR, 5/16-18X2.25 ZP
23	3400369	1	SCR - CAR, 5/16-18X2.75 ZP
24	3400425	3	PIN-CLEVIS 1/2 X 5/8 ZP
25	3400426	3	PIN-CLEVIS 3/16 X 3/4
26	3400742	6	RUE RING-1/4 HEAVY ZP
27	3401639	1	ORIFICE-BRASS #335 .046" DIA HYD 3/4-16
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

IMPELLER ASSEMBLY



IMPELLER ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300465	4	MOUNT-ISO IMP MNT
2	3303495	1	DECAL-QUALITY CHECK
3	3307003	1	BLADE-IMPELLER
4	3307004	1	SHROUD-IMPELLER
5	3307152	1	WELD-MOTOR MNT IMP
6	3307187	4	SPACER 1-IMPELLER PLTD SW/A
7	3315347	1	EXHAUST-IMPELLER
8	3316832	1	MOTOR-HYD IMP 0.323 CIR
9	3322121	1	MNT-IMPELLER MOTOR
10	3333915	3	ISOLATOR - RUBBER, 1.5 X 1 LG, 3/8-16 THREAD
11	3335192	1	WELD-IMPELLER MOUNT, ARMA
12	3335458	2	GASKET- TOP IMPELLER, ARMA
13	3335459	2	GASKET- BOTT IMPELLER, ARMA
14	3400016	4	SCREW-FLAT HEAD 5/16-18 X 1.25, SOC ZP
15	3400028	4	SCR-HEX 3/8 -16X1.50 ZP
16	3400079	4	NUT-HEX 3/8-16 ES ZP
17	3400080	4	NUT-HEX 5/16-18 ES ZP
18	3400081	2	NUT-HEX 1/4-20 ES ZP
19	3400088	4	WASHER 5/16 ID .688 OD X .065 THK
20	3400089	4	WASHER 1/4 ID .63 OD X .065 THK
21	3400154	2	FTG-90 EL 3/4-16 MORB X -8JIC
22	3400278	4	WASHER-FENDER 3/8 ZP
23	3400420	1	NUT-HEX 5/16-24 ES
24	3400844	1	FTG-4R50X-S
25	3402008	2	SCR-HEX,1/4-20 x 3.50 ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

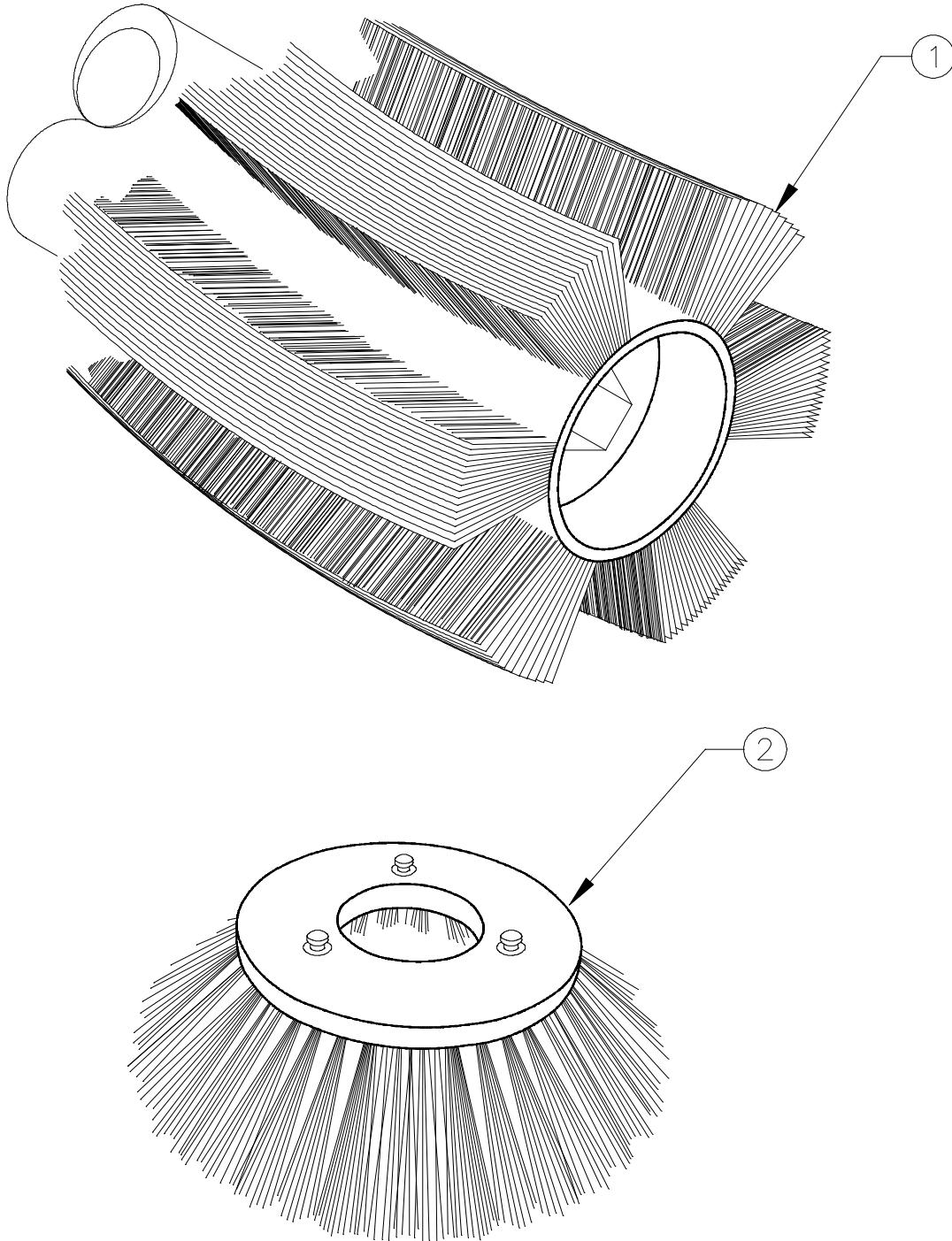
MAIN BROOM ASSEMBLY



PARTS BREAKDOWN

MAIN BROOM ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300558	1	KNOB-PLASTIC TAPERED #145 BLACK
2	3334987	1	WELDMENT-MAIN BROOM LEVER
3	3400084	1	NUT-WING 1/2-13
4	3400091	1	WASHER-FENDER 1/2
5	3300352	1	KNOB-MAIN BROOM LIFT ADJUST
6	3335112	1	WELDMENT-MAIN BROOM PIVOT LIFT
7	3334984	1	ROD-LIFT MAIN BROOM
8	3301447	1	CLEVIS-CABLECRAFT AC-218
9	3301285	1	RETAINER-MAIN BROOM DRIVER HUB
10	3301050	1	HUB-MAIN BROOM DRIVE
11	3400151	1	FTG-STRAIGHT 7/8-14 TO #8
12	3316898	1	MOTOR-HYD MAIN BROOM
13	3330338	1	KEY-SHAFT D-FOSS CB/MB/SC MOTORS
14	3307337	3'	GASKET-MAIN BROOM ARM
15	3307338	3'	RETAINER-GASKET MAIN BROOM ARM
16	3350101	1	MAIN BROOM MNT10X
17	3307181	1	SPACER-MAIN BROOM
18	3300432	2	BUSHING-FL-52-4
19	--XXX--	-	NOT SOLD SEPARATELY
20	3305667	1	BEARING-MAIN BROOM
21	3305642	1	HUB-BROOM IDLER
22	3400047	1	SCR-SOCKET, 5/16-18x0.75
23	3305666	1	RING-RETAINING MAIN BROOM
25	3335220	1	MAIN BROOM PLT
26	3400748	1	KNOB-HAND 1/2-13x1-1/2 DOG POINT
27	3335196	1	PLATE-LIFT ARM, MAIN BROOM, ARMA
28	3400091	1	WASHER-FENDER 1/2
29	3400022	1	SCR-HEX,1/2-13X1.25
30	3333672	1	SPACER-MB LIFT ROD
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

SIDE BROOM & MAIN BROOM



SIDE BROOM & MAIN BROOM			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3321123	1	BROOM-MAIN 56" PROEX & WIRE (STANDARD)
	3315722	1	BROOM-HIGH DENSITY NYLON 56"
	3315724	1	BRM-MAIN NYLON 56"
	3315726	1	BRM-MAIN HERRINGBONE (PATROL) 56"
	3315812	1	BRM-MAIN HI DEN FIBER/WIRE 56"
	3315721	1	BRM-MAIN CRINKLE WIRE 56"
2	3339964	1	BROOM, SIDE 26" POLY (STANDARD)
	3339963	1	BROOM, SIDE 26" NYLON
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

Main Broom User's Guide

Proex & Wire - Slightly encrusted soilage & dusty conditions. High heat.

Nylon - General purpose broom with long life bristles.

Poly Proex - All purpose broom that stands up well on rough surfaces.

High Density Nylon - Highly effective for small particle soilage. Severe dust environments.

Crinkle Wire - Stiff bristles for compacted grime, oil, grease or mud. Fair to good broom life.

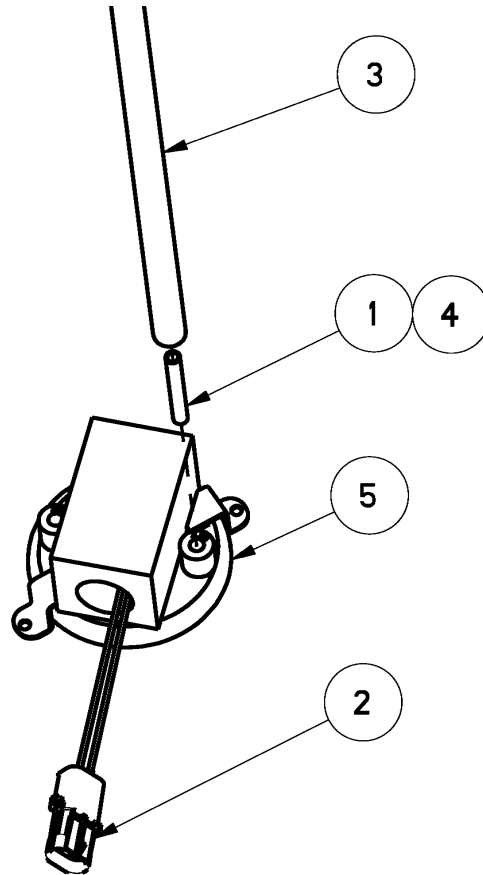
Natural Fiber & Wire - Good all around broom. Good for high heat applications.

Side Broom User's Guide

Poly - Stiff bristles for aggressive sweeping of mainly heavy litter. Not suited for high heat.

Nylon - Provides longest life. Recommended for tough sweeping jobs.

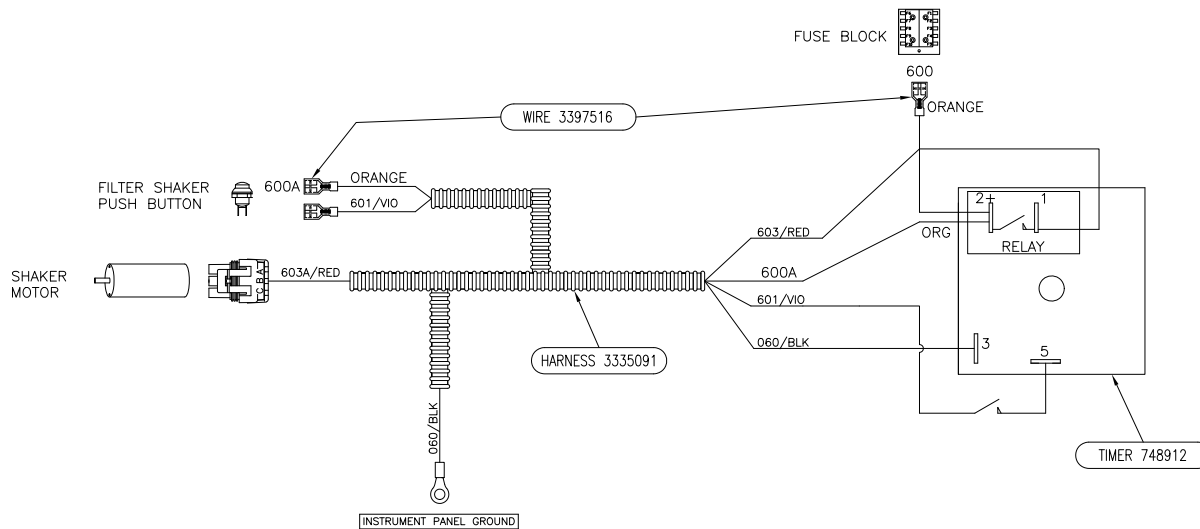
VACUUM SWITCH



VACUUM SWITCH			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3303105	1	FTG-NIPPLE 1/8" MPT X 2.00 LG
2	3310089	1	HARNES-CLOGGED FILTER
3	3310097	1	HOSE-5/16 ID X 10.50 CLOGGED FILTER
4	3401122	0.1	SEALANT-THREADED PIPE, 565 PST
5	3303327	1	SWITCH-PRESSURE, SERIES
-	3400045	2	SCR-PAN,#8-32X0.62,SLT ZP
-	3400082	2	NUT-HEX #8-32 ES ZP

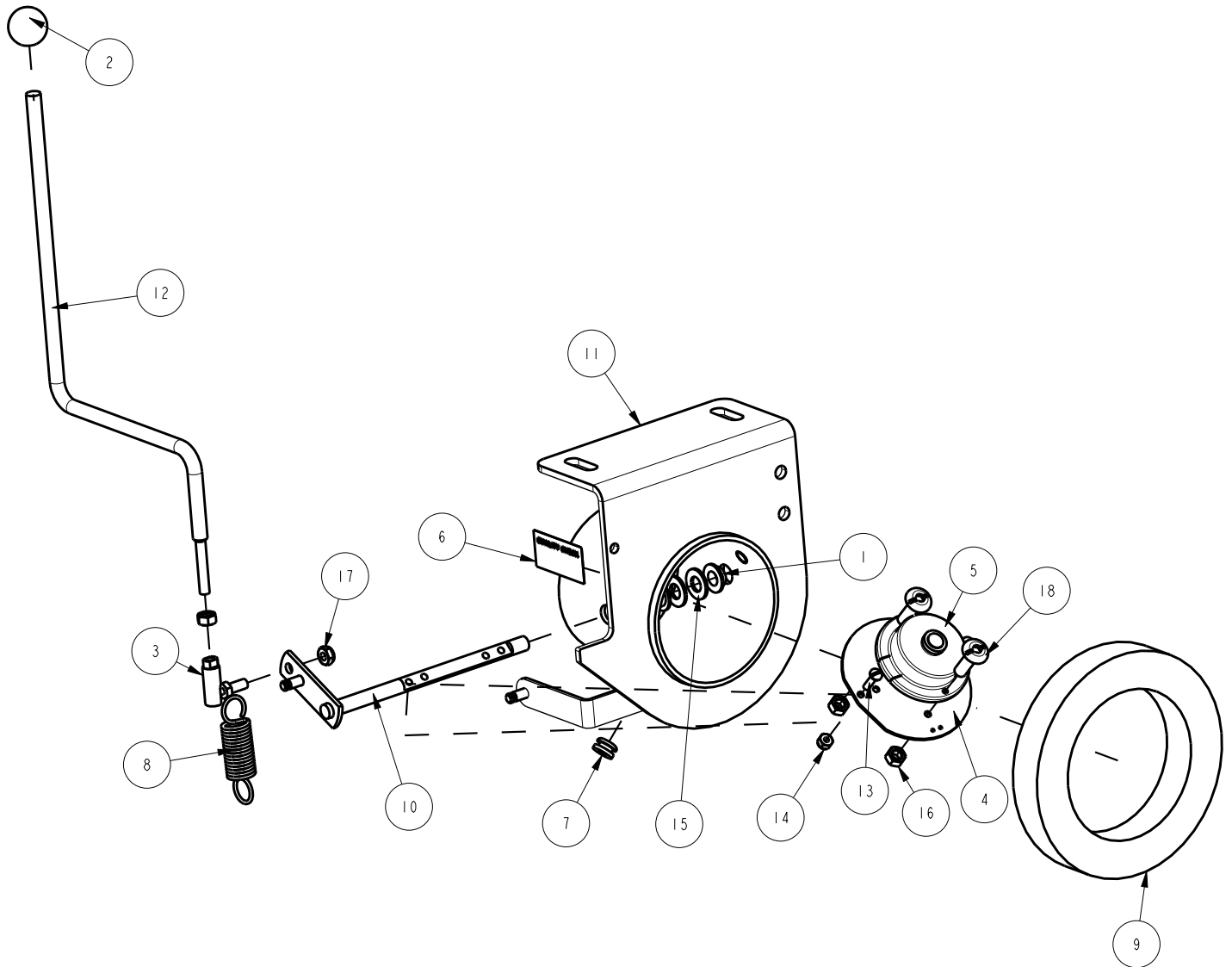
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

TIMER-FILTER SHAKER SEALED



TIMER-FILTER SHAKER SEALED			
ITEM	PART NO.	REQ'D	DESCRIPTION
-	748912	1	TIMER, OFF DELAY 12V DC 15A ONE SHOT 20
-	3335091	1	HARNESS - MAIN, 10X ARMADILLO
-	3397516	1	WIRE, 16G ORANGE- TIMER JUMPER-10X
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

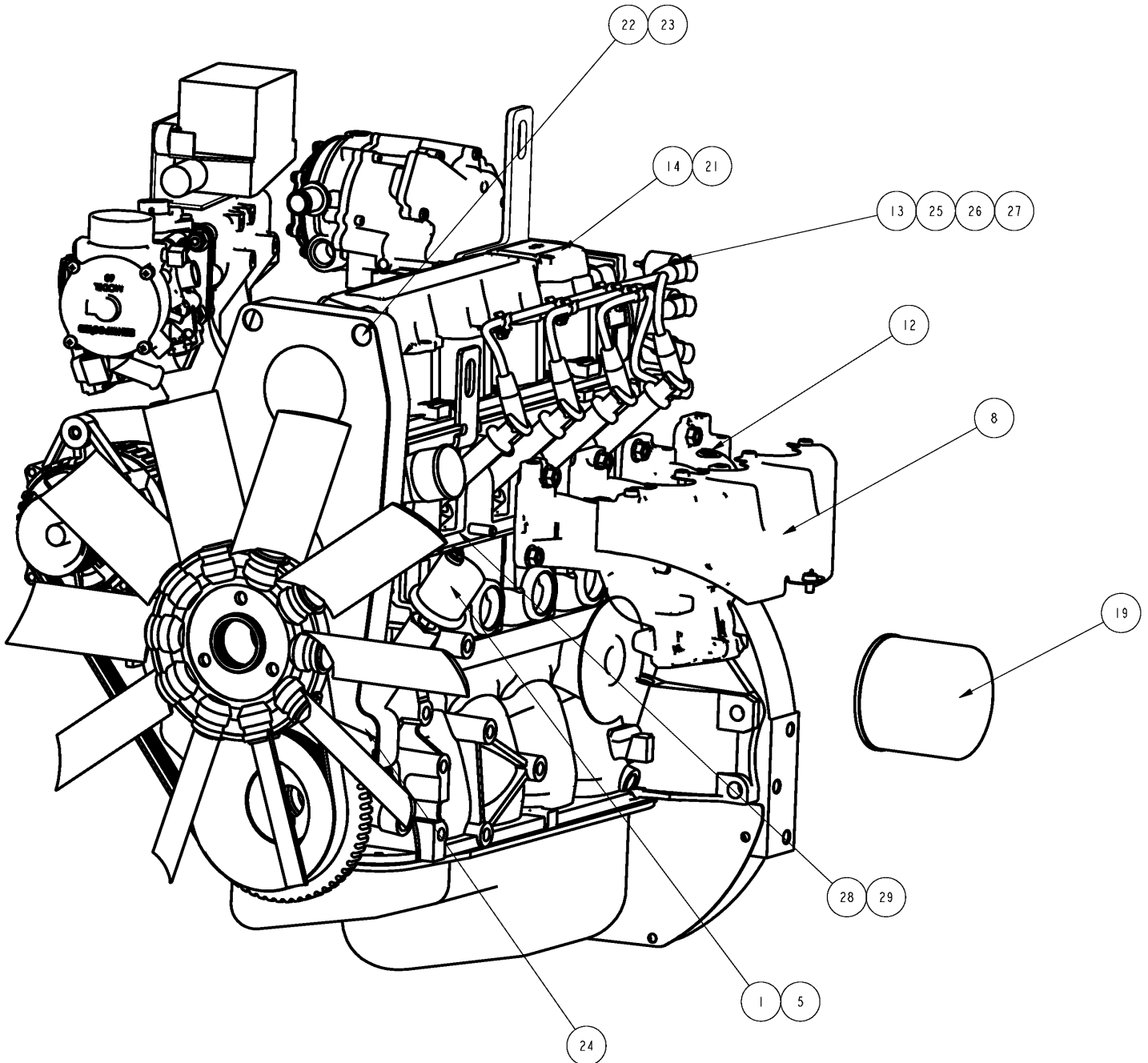
GASKET MOUNT ASSEMBLY



GASKET MOUNT ASSEMBLY			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300414	2	BUSHING-FLNG 3/8 NYLON
2	3300563	1	KNOB-BALL 1" DIA #113 - BLACK
3	3301199	1	BALL JOINT 1/4-28 W/ DUST SHIELD
4	3301498	1	DAMPER-HOPPER SHUTOFF PLTD
5	3303003	1	SENSOR-FIRE
6	3303495	1	DECAL-QUALITY CHECK
7	3303729	1	GROMMET-.25ID X .56OD X .12GRV
8	3304160	1	SPRING-EXTENTION, 2.00 LG
9	3307005	1	GASKET-IMPELLER SW/A
10	3307155	1	ASSY - GASKET MNY BAFFLE
11	3307182	1	WELD-GASKET MNT
12	3350206	1	ROD-WET SWEEP BY-PASS
13	3400045	2	SCR-8-32 X 5/8 PAN HD SLT ZP
14	3400082	2	NUT-HEX #8-32 ES ZP
15	3400087	2	WASHER 3/8 ID .81 OD X .065 THK
16	3400180	3	NUT-HEX 1/4-28 ZP
17	3400373	1	NUT-HEX 1/4-28-ES-ZP
18	3400428	2	SCREW- PAN, #6-32 X 1.0 , SLT ZP
-	3310099	1	HARNES-FIRE IN HOPPER INDICATOR (NOT SHOWN)
-	3317148	1	HARNES-FIRE IN HOPPER INDICATOR (NOT SHOWN)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L LPG & GASOLINE - OIL FILTER, PLUG WIRES & WATER PUMP

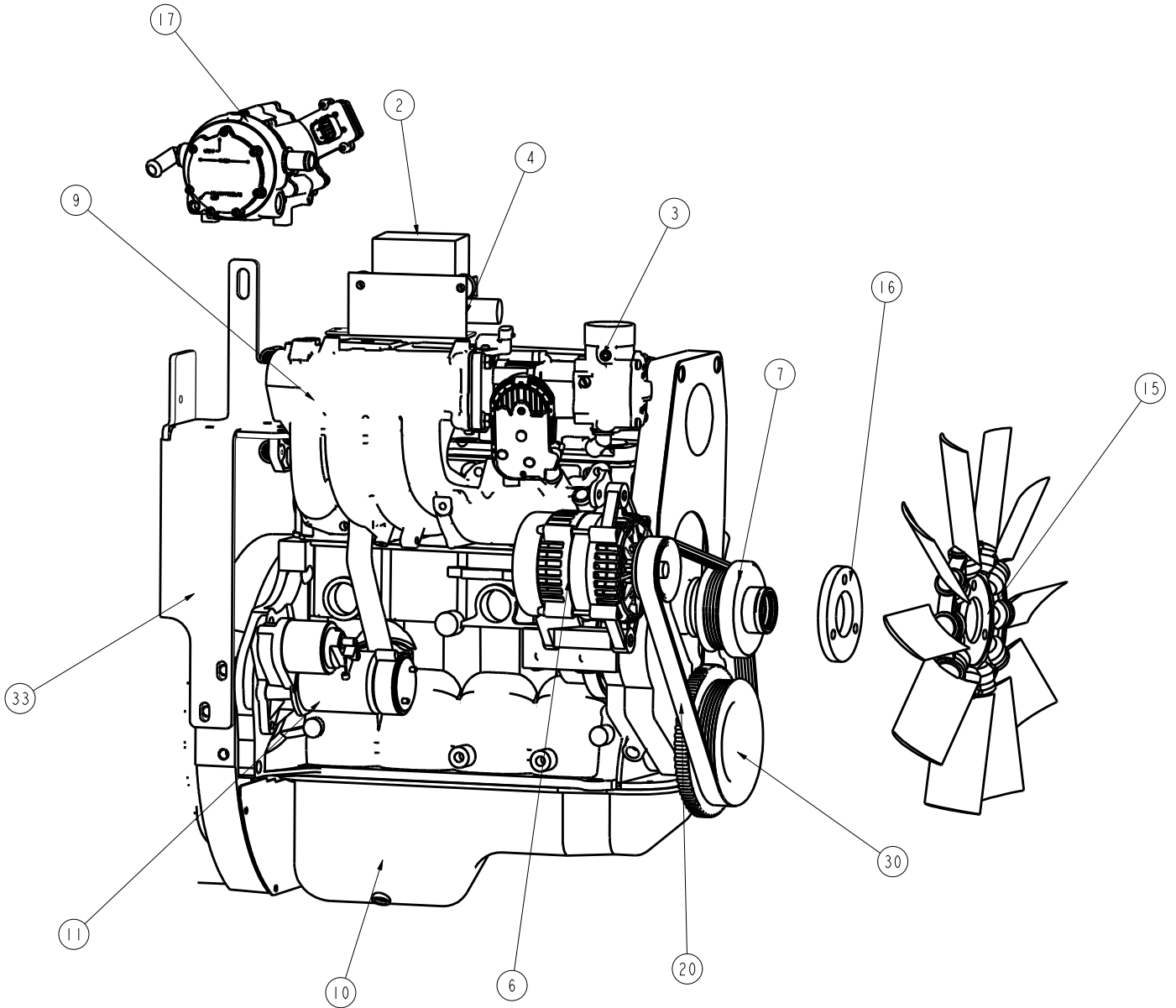
NOTE: LPG Engine Shown



ENGINE GM 1.6L LPG & GASOLINE - OIL FILTER, PLUG WIRES & WATER PUMP				
ITEM	PART NO.		REQ'D	DESCRIPTION
	GAS	LPG		
1	3342078		1	ADAPTER-1.6L GM OIL SENDER
5	3341069		1	SENDER-OIL PRESSURE 12V
8	3343864		1	SHIELD EXHAUST MANIFOLD
12	3343657		1	MANIFOLD-GM 1.6L EXHAUST
13	3342410		1	WIRE-SPLG #1CYL GM 1.6L
14	3342354		1	COVER-CM/SHF HSG GM 1.6L
19	3342201		1	FILTER-OIL (AC-DELCO)
21	3342356		1	GASKET-CAM/SHAFT HSG COVER GM 1.6L
22	3343656		1	FRONT COVER FOR TIMING BELT GM 1.6L
23	3342385		1	BELT-TMG (111 TEETH) GM 1.6L (Behind Cover Not Shown On Drawing)
24	3343668		1	WATER PUMP GM 1.6 Kit (Behind Cover Not Shown On Drawing)
25	3342411		1	WIRE-SPLG #2CYL GM 1.6L
26	3342412		1	WIRE-SPLG #3CYL GM 1.6L
27	3342413		1	WIRE-SPLG #4CYL GM 1.6L
28	3343660		1	CYLINDER HEAD-GM 1.6L
29	3342365		1	GASKET KIT FOR GM 1.6L CYLINDER HEAD
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS				

ENGINE GM 1.6L LPG & GASOLINE - FAN, ALTERNATOR BELT & STARTER

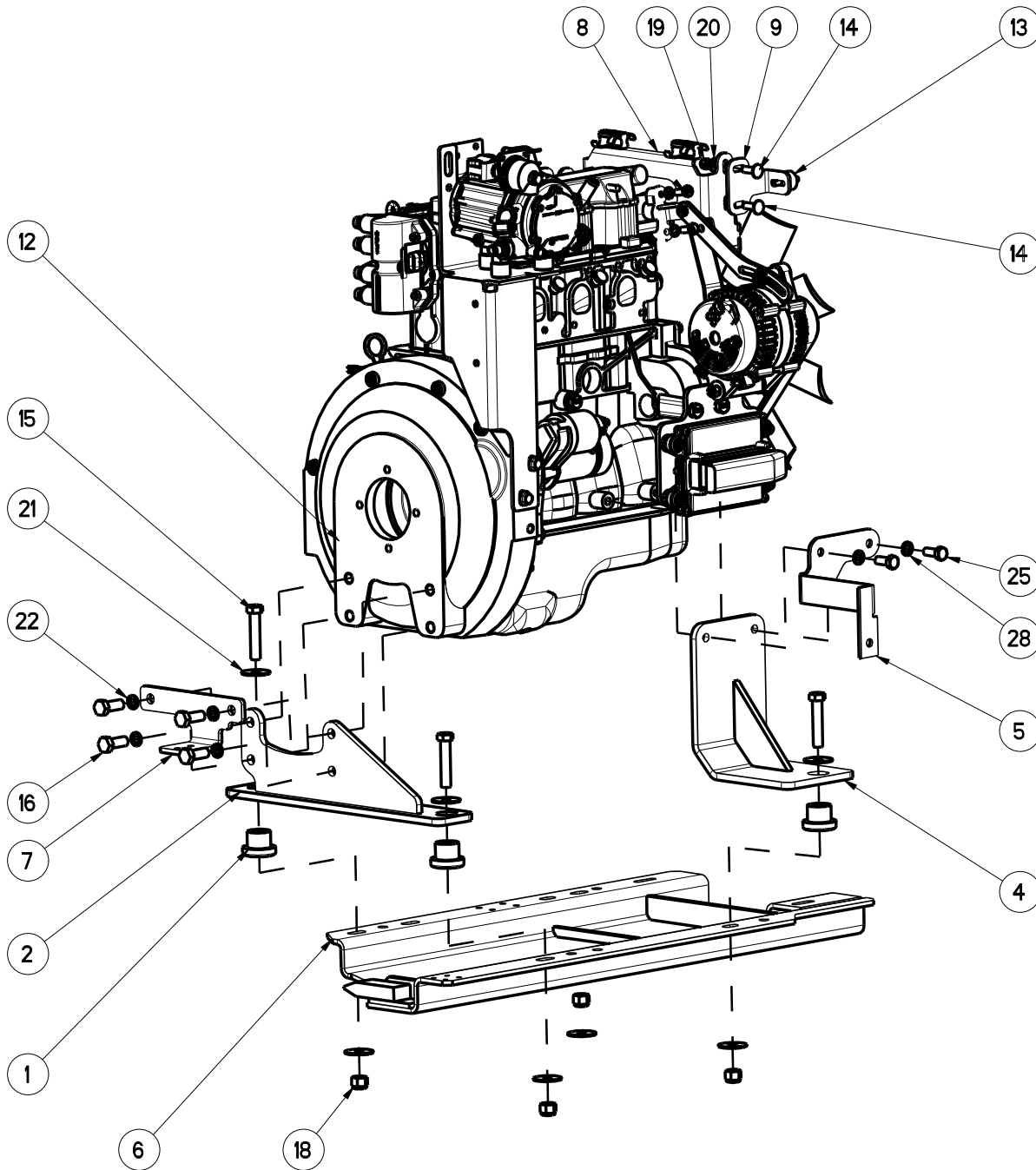
NOTE: LPG Engine Shown



ENGINE GM 1.6L LPG & GASOLINE - FAN, ALTERNATOR BELT & STARTER				
ITEM	PART NO.		REQ'D	DESCRIPTION
	GAS	LPG		
2	3343866		1	BOX-FUSE, 1.6 W/ HARNESS
3	3343627		1	THROTTLE BODY-GM 1.6L BOSCH 40MM (SP)
4	3343865		1	BRACKET-FUSE BOX, 1.6 TIER 2
6	3343633		1	ALTERNATOR-GM 1.6L 7SI (DF SUR-BELT)
7	3343611		1	PULLEY FOR FAN-GM 1.6L
9	3343645		1	KIT-GM 1.6L INTAKE MANIFOLD
10	3343662		1	PAN-GM 1.6L OIL
11	3336742		1	STARTER
15	3342304		1	FAN-PUSHER 16" GM 1.6L
16	3343623		1	SPACER-GM 1.6L FAN PUSHER .85"
17	N/A	3343632	1	REGULATOR-GM 1.6L ELEC PRESS,TIER 2 & 3
20	3343634		1	BELT-GM 1.6L FAN POLY-6V 39"
30	3342317		1	PULLEY-CR/SHF GM 1.6L
33	N/A	3339854	1	BRKT-WDT REGULATOR MOUNT GM LP (SP)
-	3337904	N/A	1	ECU- GM 1.6L GASOLINE TIER 3 (NOT SHOWN)
-	N/A	3337903	1	ECU-GM1.6L, LP TIER 3 (NOT SHOWN)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS				

ENGINE GM 1.6L LPG & GASOLINE - PAN, MOTOR MOUNTS & BRACKETS

NOTE: LPG Engine Shown



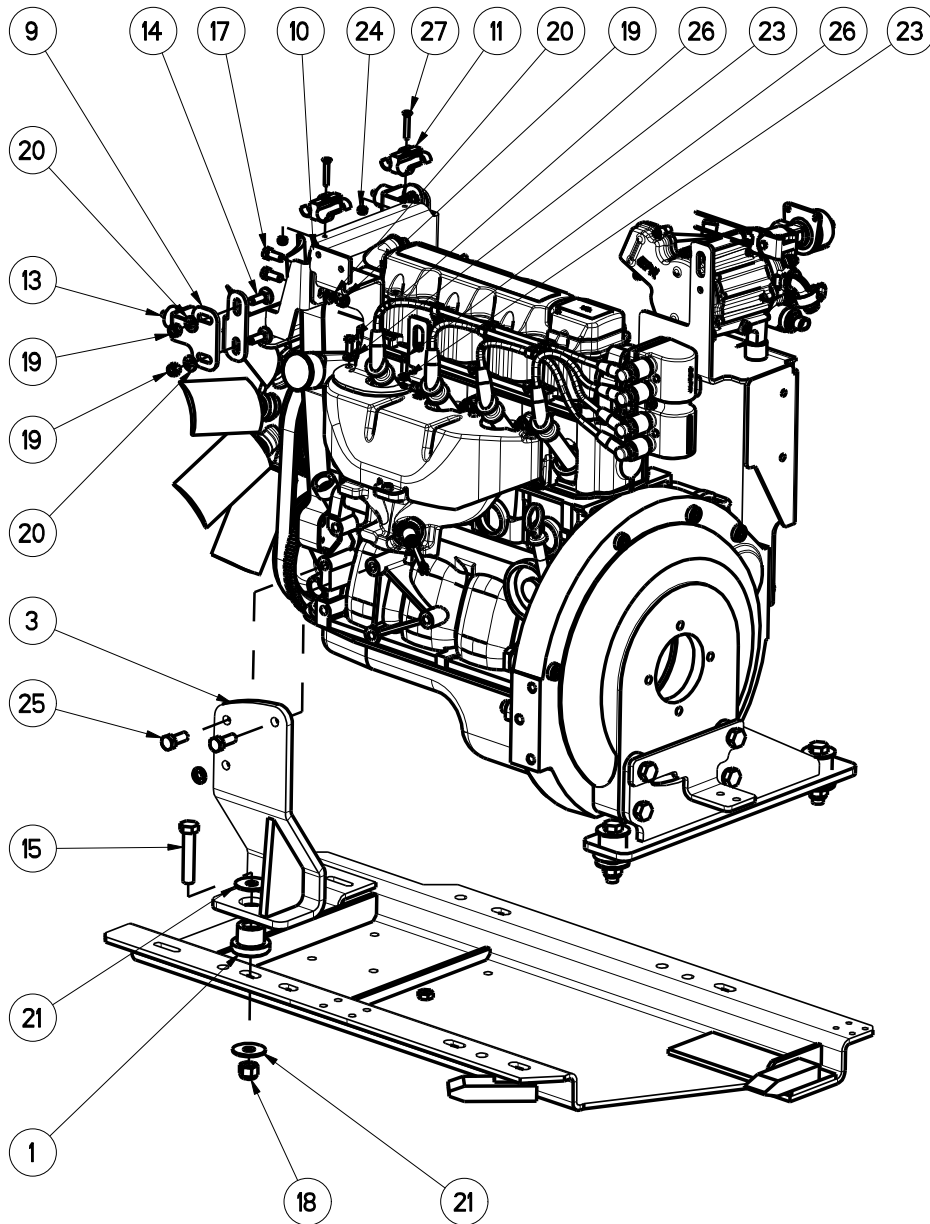
PARTS BREAKDOWN

ENGINE GM 1.6L LPG & GASOLINE - PAN, MOTOR MOUNTS & BRACKETS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300464	4	ISOLATOR-RUBBER, 1.24 DIAx1.25
2	3334865	1	WELD-MNT, GM 1.6L, REAR
3	3334883	1	WELD-MNT, GM 1.6L, LF
4	3334885	1	WELD-MNT, GM 1.6L, RF
5	3334888	1	PLT-MOUNT, HOSE RETAINER, FRONT
6	3334994	1	WELD-ENGINE PAN, GM 1.6L,
7	3335883	1	BRKT-MOUNT, FWD/REV ADJUST
8	3337495	1	WELD - UPPER RAD. MOUNT BRKT
9	3336688	2	BRKT - UPPER ISOLATOR MNT
10	3336689	1	PLT - WD, RAD. RESERVOIR BRKT
11	3342611	2	RETAINER-HOSE, 5/8 DIA. (PLASTIC)
12	3332826	1	ENGINE-LPG GM 1.6L T3
	3332827	1	ENGINE-GAS GM 1.6L T3
13	3344112	3	ISOLATOR- CYLINDRICAL, 1 DIA X 3/4 X 1/4-20,
14	3400009	4	SCR-CAR,5/16-18X1.00
15	3400019	4	SCR-HEX,1/2-13X2.50
16	3400022	4	SCR-HEX,1/2-13X1.25
-	BLANK	-	NOT USED
18	3400078	4	NUT-HEX 1/2-13 ES
19	3400080	6	NUT-HEX 5/16-18 ES
20	3400088	6	WASHER-FLAT 5/16 IDx.688 ODx.0
21	3400091	8	WASHER-FENDER 1/2
22	3400098	4	WASHER-LOCK 1/2 SPLIT
-	BLANK	-	NOT USED
-	BLANK	-	NOT USED
25	3400625	4	SCR-HHM 10MM X 25MM
-	BLANK	-	NOT USED
-	BLANK	-	NOT USED
28	3401458	3	WASHER-LOCK 10MM

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L LPG & GASOLINE - PAN, MOTOR MOUNTS & BRACKETS (CONTINUED)

NOTE: LPG Engine Shown



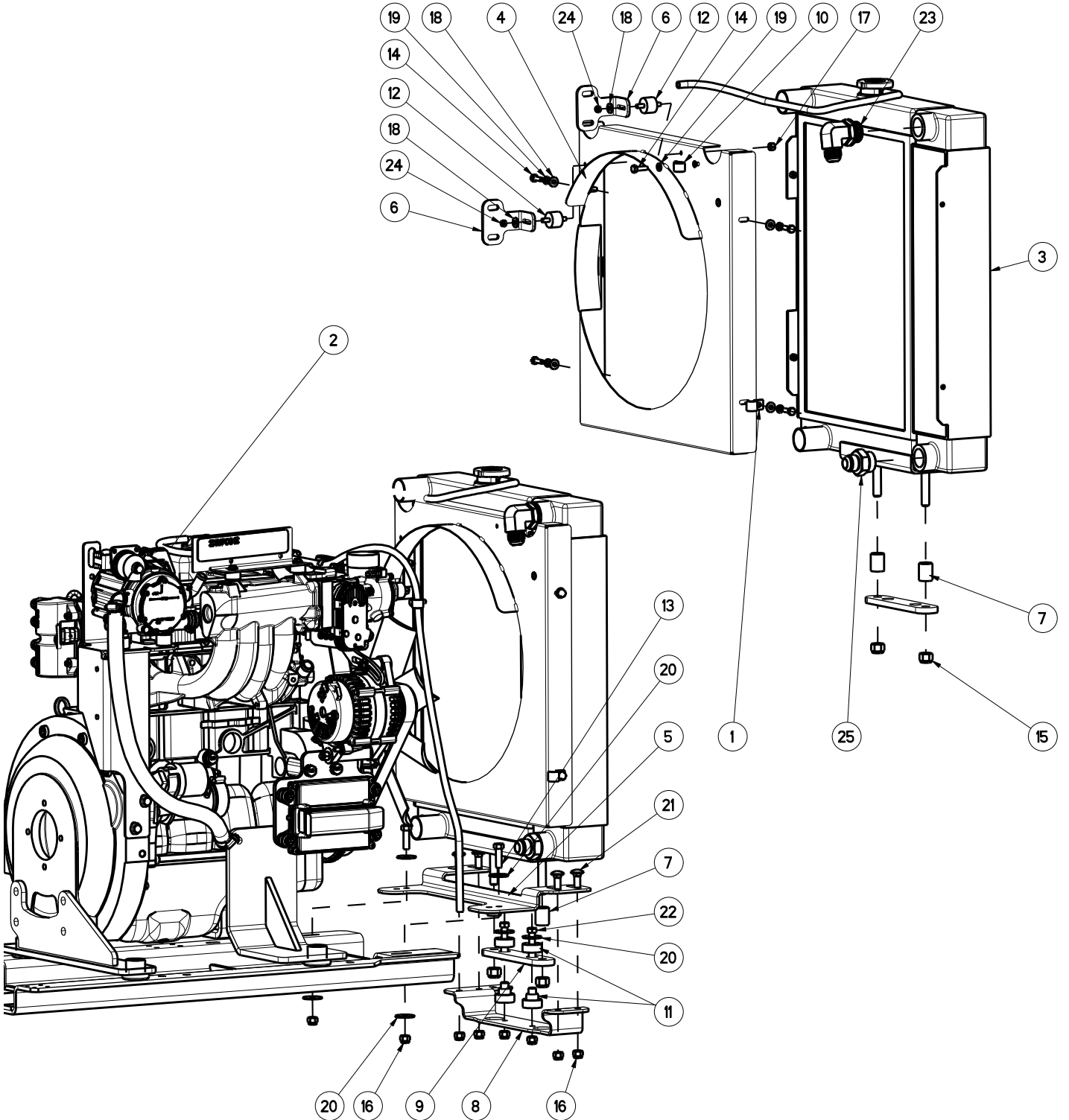
**ENGINE GM 1.6L LPG & GASOLINE - PAN, MOTOR MOUNTS & BRACKETS
 (CONTINUED)**

ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300464	4	ISOLATOR-RUBBER, 1.24 DIAx1.25
-	BLANK	-	NOT USED
3	3334883	1	WELD-MNT, GM 1.6L, LF
-	BLANK	-	NOT USED
-	BLANK	-	NOT USED
-	BLANK	-	NOT USED
-	BLANK	-	NOT USED
-	BLANK	-	NOT USED
9	3336688	2	BRKT - UPPER ISOLATOR MNT
10	3336689	1	PLT - WD, RAD. RESERVOIR BRKT
11	3342611	2	RETAINER-HOSE, 5/8 DIA. (PLASTIC)
-	BLANK	-	NOT USED
13	3344112	2	ISO-CYL, 1 DIA X 3/4 X 1/4-20,
14	3400009	4	SCR-CAR,5/16-18X1.00
15	3400019	4	SCR-HEX,1/2-13X2.50
-	BLANK	-	NOT USED
17	3400036	2	SCR-HEX, 5/16-18x0.75
18	3400078	4	NUT-HEX 1/2-13 ES
19	3400080	6	NUT-HEX 5/16-18 ES
20	3400088	6	WASHER-FLAT 5/16 IDx.688 ODx.0
21	3400091	8	WASHER-FENDER 1/2
-	BLANK	-	NOT USED
23	3400103	2	WASHER-LOCK 1/4 SPLIT
24	3400399	2	NUT-HEX NYLON LOCK #10-24 SS
25	3400625	4	SCR-HHM 10MM X 25MM
26	3400737	2	SCR-HEX 6MM X 16MM
27	3401099	2	SCR-FLT, 10-24X1.25, SOC

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L LPG & GASOLINE - RADIATOR & BRACKETS

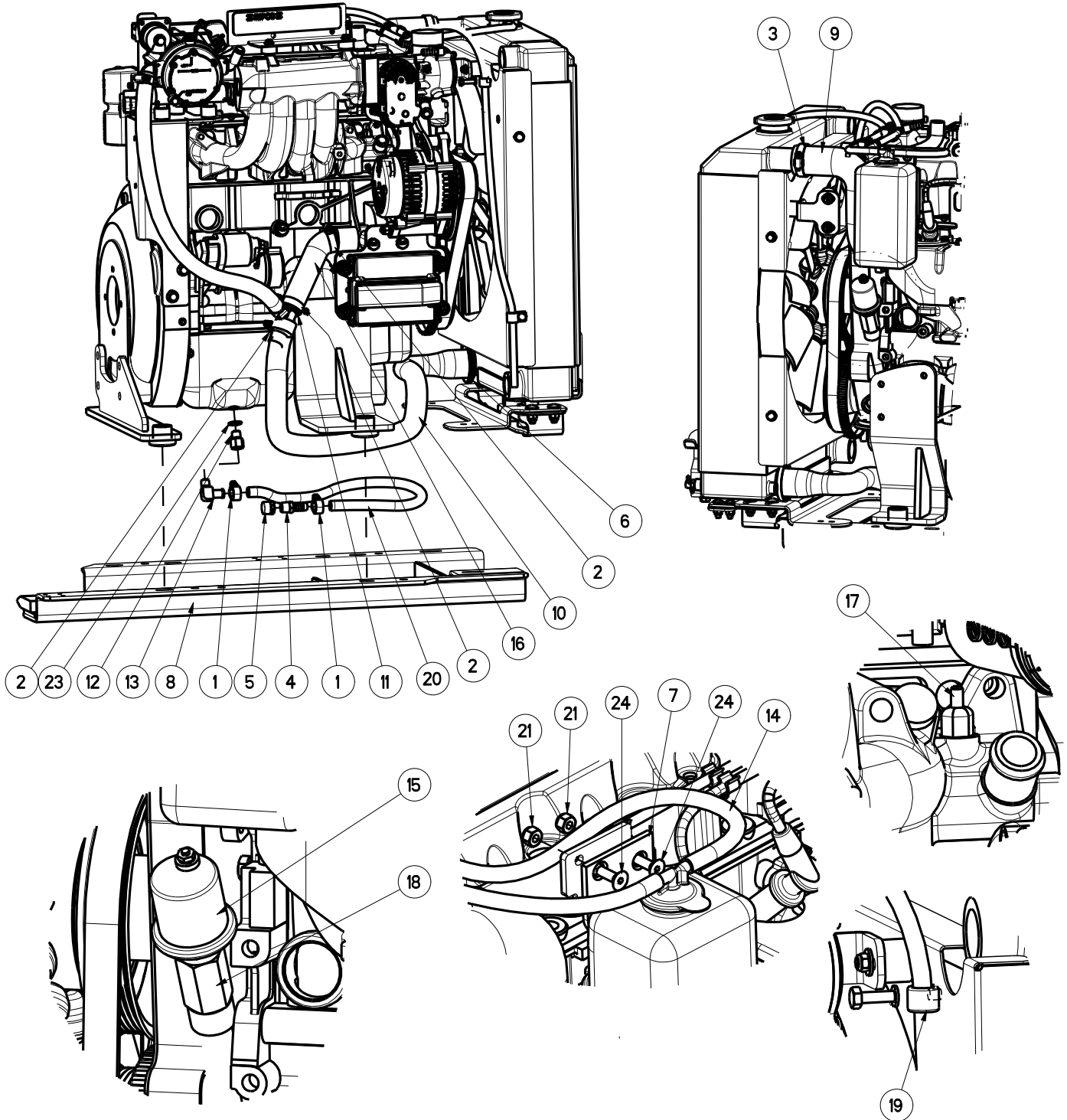
NOTE: LPG Engine Shown



ENGINE GM 1.6L LPG & GASOLINE - RADIATOR & BRACKETS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3302543	1	CLAMP-SADDLE TYPE 5/16" DIA.
2	3318752	1	RESERVOIR - COOLANT OVERFLOW 6.75" X 3.6" X 3.0"
3	3335476	1	RADIATOR-OIL COOLER,
4	3343441	1	WELD - SHROUD, RADIATOR,
5	3336626	1	PLT- BASE, RADIATOR MOUNT
6	3336688	2	BRKT - UPPER ISOLATOR MNT
7	3336690	2	SPACER - .625 ID X .875 OD X 1.125 LG
8	3336703	1	PLT - RADIATOR MNT
9	3336704	1	PLT - BASE, RADIATOR MNT
10	3343082	1	CLAMP-PIPE, 9/16 DIA, INSULATE
11	3344110	2	ISOLATOR-BONDED BUSHING BOTTOM RADIATOR
12	3344112	3	ISO-CYL, 1 DIA X 3/4 X 1/4-20,
13	3400029	2	SCR-HEX, 3/8-16x1.25
14	3400041	5	SCR-HEX,1/4-20X0.88
15	3400078	2	NUT-HEX 1/2-13 ES
16	3400079	8	NUT-HEX 3/8-16 ES
17	3400081	4	NUT-HEX 1/4-20 ES
18	3400089	8	WASHER-FLAT 1/4 STANDARD
19	3400103	7	WASHER-LOCK 1/4 SPLIT
20	3400278	6	WASHER-FENDER 3/8
21	3400379	4	SCR-CAR,3/8-16X1.00
22	3401454	2	BOLT-HEX, TAP 3/8-16 X 2
23	3401495	1	FTG-90° 1 5/16-12 STOR X #12 JIC
24	3401569	2	NUT-HEX JAM 1/4-20 ES
25	3402003	1	FTG-ADAPTER STRAIGHT#12 TO #16
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L LPG & GASOLINE - RADIATOR HOSES, SENDING UNITS & CLAMPS

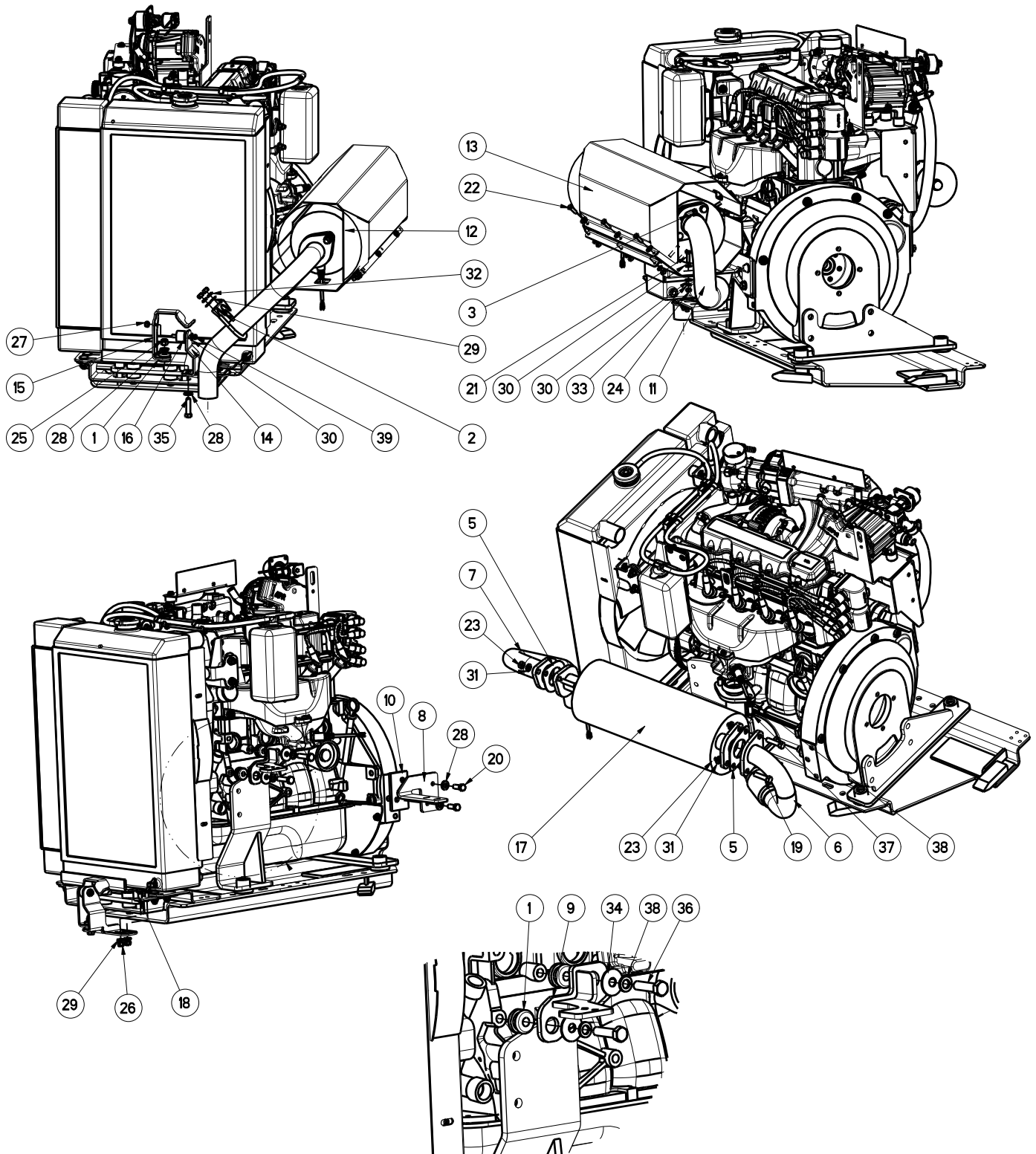
NOTE: LPG Engine Shown



ENGINE GM 1.6L LPG & GASOLINE - RADIATOR HOSES, SENDING UNITS & CLAMPS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3302144	2	CLAMP-HOSE 1\2 NOM
2	3302193	3	CLAMP-HOSE 1.25 NOM
3	3303255	2	CLAMP-HOSE 1.75 DIA NOMINAL
4	3307829	1	FTG-HOSE BARB 1/2 X 3/8 MPT
5	3307830	1	FTG-CAP 3/8 FPT
6	3312189	1	CLAMP-HOSE 2" NOMINAL SS WORM
7	3318752	1	RESERVOIR - COOLANT OVERFLOW 6.75" X 3.6" X 3.0"
8	3334994	1	WELD-ENGINE PAN, GM 1.6L,
9	3335454	1	HOSE-RADIATOR, UPPER, ARMA
10	3335455	1	HOSE-RADIATOR, LOWER, ARMA
11	3336081	1	FTG-TEE HOSE, REDUCING BARB, 1" X 5/8"
12	3336592	1	FTG-ADAPTOR, 14MM X 1.5 THREAD
13	3336593	1	FTG-BH BARB, 90° ELL, 1/4 MPT
14	3336719	1	HOSE - 1/4 ID, COOLANT OVERFLOW
15	3341069	1	SENDER-OIL PRESSURE 12V
16	3341793	1	HOSE-RADIATOR BTM SHORT
17	3341806	1	SENDER-TEMPERATURE 1/8 NPT
18	3342078	1	ADAPTER-1.6L GM OIL SENDER
19	3343082	1	CLAMP-PIPE, 9/16 DIA, INSULATE
20	3343108	1	HOSE-1/2 ID X 20 EEC-PCV
21	3400081	5	NUT-HEX 1/4-20 ES
23	3401466	1	SEAL-OIL PAN DRAIN, GM 1.6L ENG
24	3401542	2	SCR - FHSCS, 1/4-20 X 3/4 L, Z
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L LPG & GASOLINE - EXHAUST SYSTEM

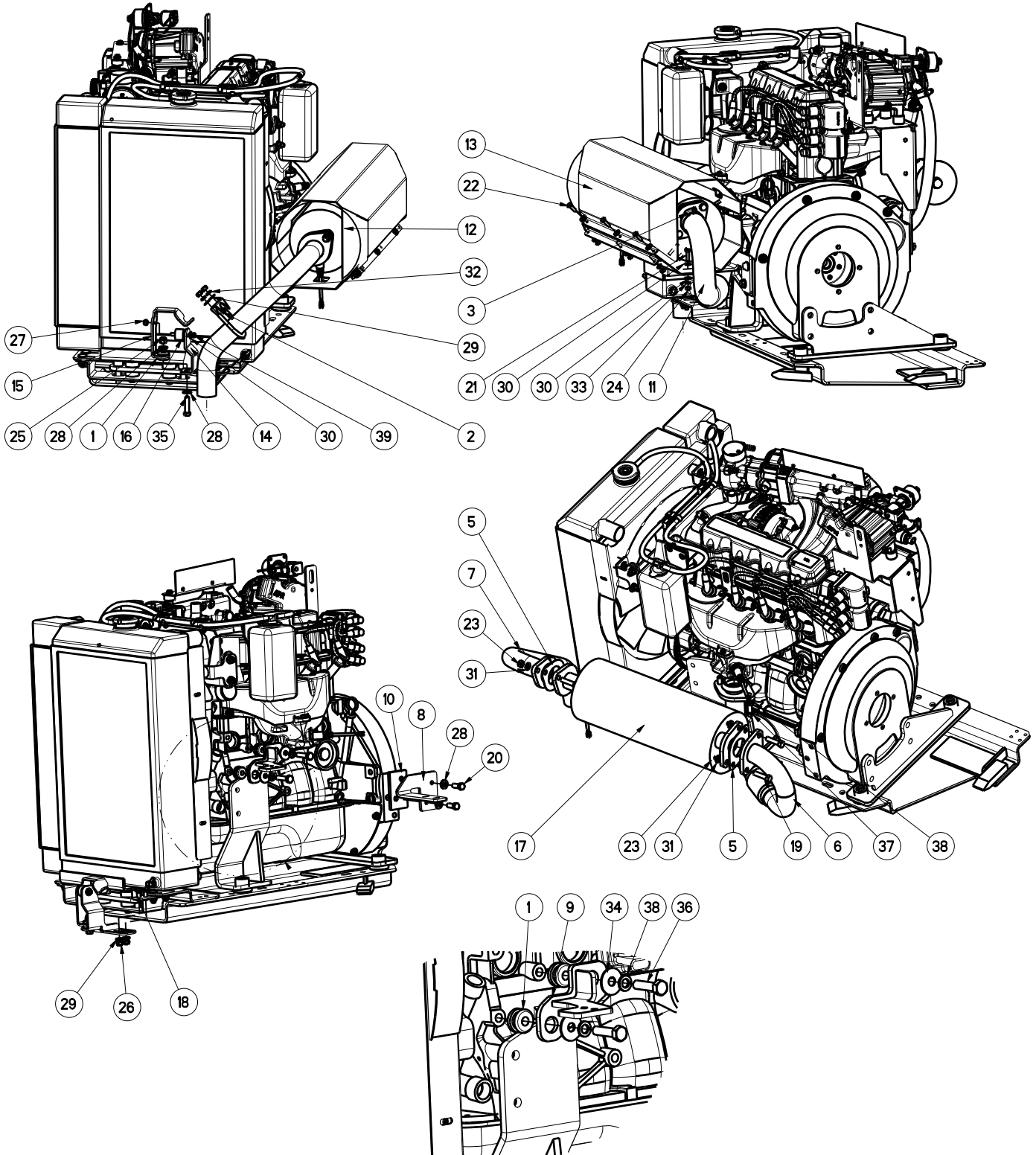
NOTE: LPG Engine Shown



ENGINE GM 1.6L LPG & GASOLINE - EXHAUST SYSTEM			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300465	2	ISOLATOR-RUBBER (.375IDx.81OD)
2	3301640	1	CLAMP-EXHAUST 1 3/4
3	3303255	2	CLAMP-HOSE 1.75 DIA NOMINAL
5	3333656	2	GASKET-EXHAUST CATALYST, 2" ID, 2 HOLE
6	3334890	1	WELD-EXHAUST, HEADER PIPE, ARM
7	3336977	1	WELD-EXH TAIL PIPE GM 1.6L ENG 10.8 LG
8	3335011	1	PLT-MNT, HEAT SHIELD, FRONT, ARMA
9	3335030	1	WELD- HEAT SHIELD MNT, FRONT,
10	3335193	1	ISOLATOR-RUBBER, SHIELD MOUNT,
11	3335884	1	PLT - WD, FRONT BAR, CENTER CONSOLE (LP UNITS ONLY)
12	3336029	1	PLT-HEAT SHIELD, EXHAUST, BOTTOM
13	3336030	1	WELD-HEAT SHIELD, EXHAUST, TOP
14	3336978	1	WELD - EXHAUST MNT, ISOLATOR BRKT, 10X
15	3336980	1	PLT - EXHAUST MNT BRKT 10X
16	3344112	3	ISO-CYL, 1 DIA X 3/4 X 1/4-20,
17	3350056	1	MUFFLER-GM 1/6 L TIER 2 CAT
18	3400009	6	SCR-CAR,5/16-18X1.00
19	3400028	4	SCR-HEX,3/8-16x1.50
20	3400030	2	SCR-HEX,3/8-16X1.00
21	3400041	5	SCR-HEX,1/4-20X0.88
22	3400042	5	SCR-HEX,1/4-20X0.75
23	3400068	4	NUT-HEX 3/8-16
24	3400071	9	NUT-HEX 1/4-20
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

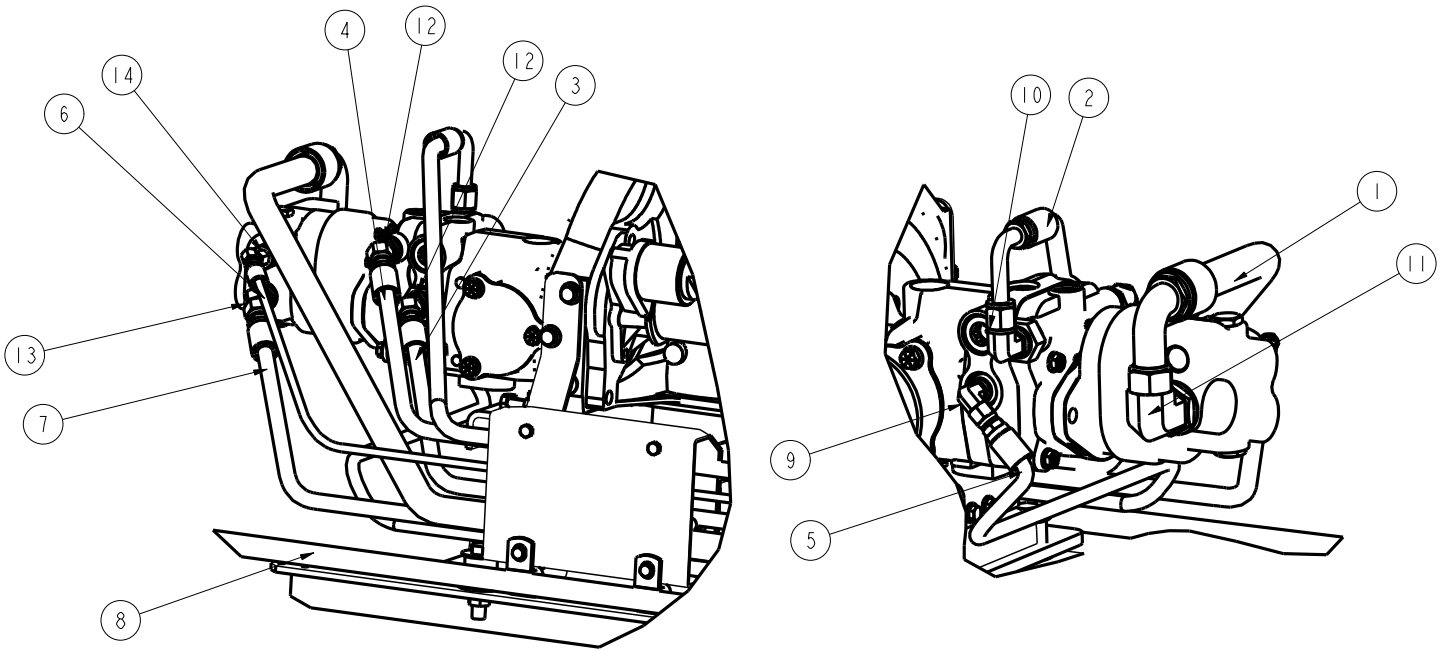
ENGINE GM 1.6L LPG & GASOLINE - EXHAUST SYSTEM (CONTINUED)

NOTE: LPG Engine Shown



ENGINE GM 1.6L LPG & GASOLINE - EXHAUST SYSTEM (CONTINUED)			
ITEM	PART NO.	REQ'D	DESCRIPTION
25	3400079	7	NUT-HEX 3/8-16 ES
26	3400080	8	NUT-HEX 5/16-18 ES
27	3400081	5	NUT-HEX 1/4-20 ES
28	3400087	4	WASHER-FLAT 3/8 STANDARD
29	3400088	10	WASHER-FLAT 5/16 IDx.688 ODx.0
30	3400089	16	WASHER-FLAT 1/4 STANDARD
31	3400101	4	WASHER-LOCK 3/8 SPLIT
32	3400102	2	WASHER-LOCK 5/16 SPLIT
33	3400103	12	WASHER-LOCK 1/4 SPLIT
34	3400278	4	WASHER-FENDER 3/8
35	3400455	1	SCR-HEX,3/8-16X1.50 SS
36	3400611	2	SCR-HHM 10 MM X 40 MM LG
37	3401051	2	SCR-M10-1.5 X 30 HEX HEAD GR 8.8
38	3401458	4	WASHER-LOCK 10MM
39	3401569	3	NUT-HEX JAM 1/4-20 ES
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

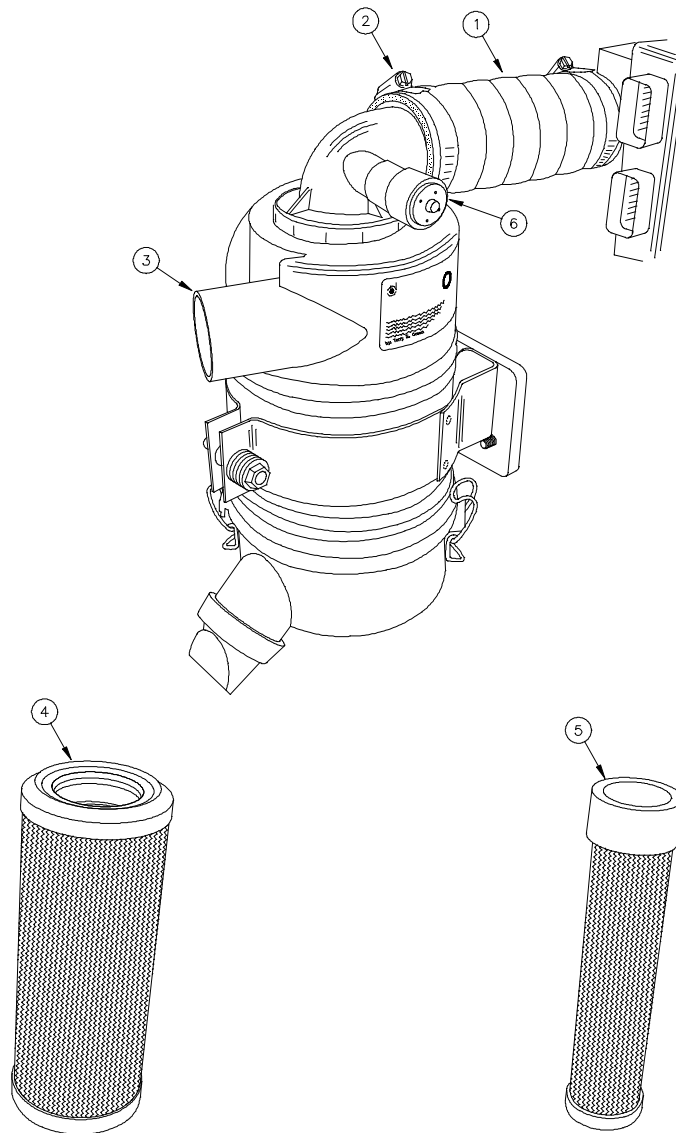
ENGINE GM 1.6L LPG & GASOLINE - HYDRAULIC HOSES & FITTINGS



ENGINE GM 1.6L LPG & GASOLINE - HYDRAULIC HOSES & FITTINGS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3307669	1	HOSE-1.0 AR 160.00 ST#16 90L#16
2	3307682	1	HOSE-1/2 AR 178.00 ST#8 90L#8
3	3307684	1	HOSE-1/2 AR 168.50 ST#8 ST#8
4	3307685	1	HOSE-1/2 AR 151.50 ST#8 ST#8
5	3307686	1	HOSE-3/8 AR 160.50 ST#8 ST#6
6	3307687	1	HOSE-1/4 AR 151.00 ST#4 90L#4
7	3307688	1	HOSE-1/2 AR 152.00 ST#8 45#8
8	3334239	1	HOSE-3/4AR 163.00 #12ST #12ST
9	3400153	1	FTG-90 6MJIC X 6MORB
10	3400154	1	FTG-90 EL 3/4-16 MORB X -8JIC
11	3400156	1	FTG-90 #16 O-RING TO #12 JIC
12	3400157	2	FTG-45 3/4-16 TO #8
13	3400158	1	FTG-45 3/4-16 TO #8
14	3400248	1	FTG-SWIVEL 45 ELL #4JIC 1/4

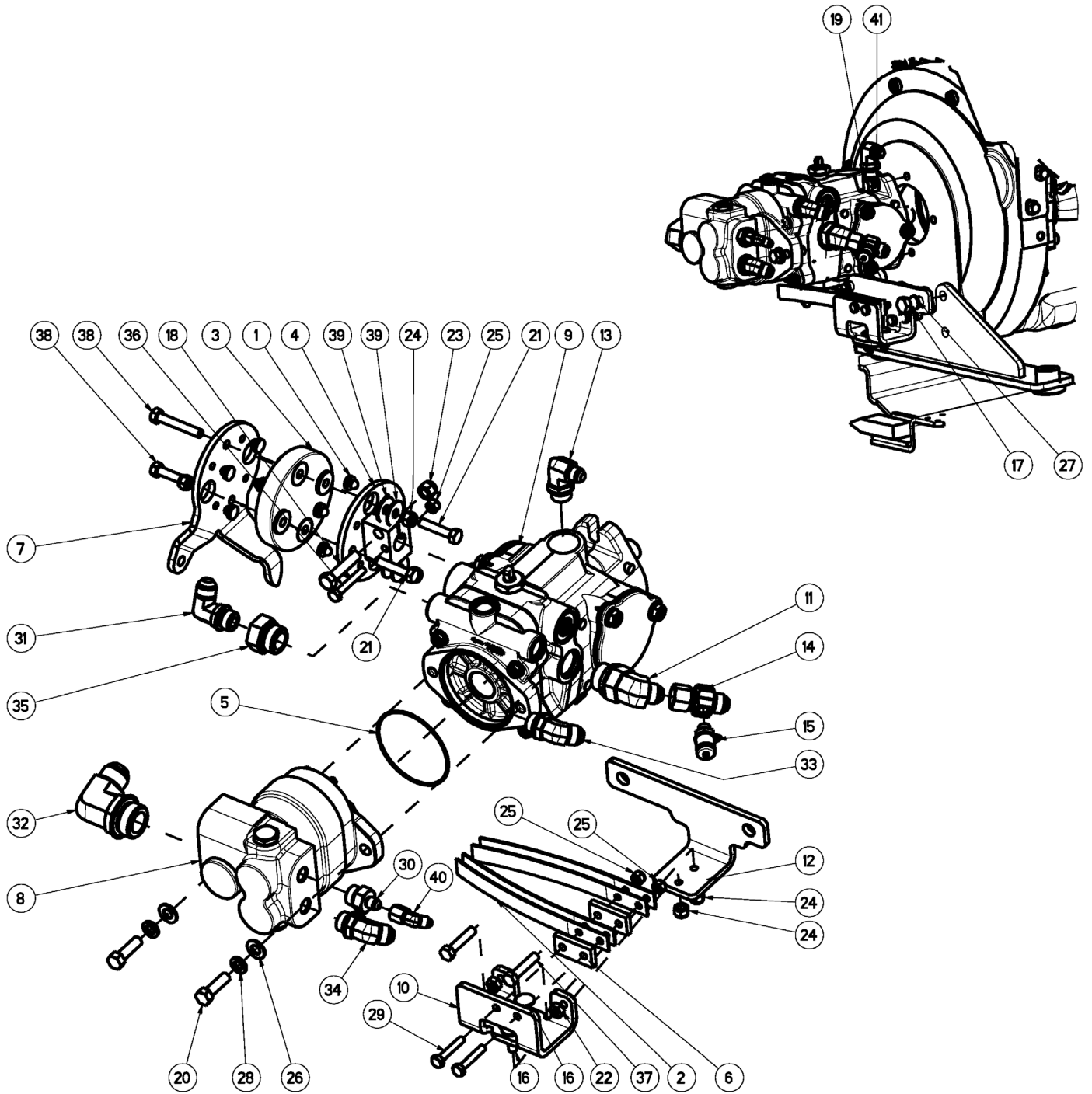
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L LPG & GASOLINE - AIR CLEANER



ENGINE GM 1.6L LPG & GASOLINE - AIR CLEANER			
ITEM	PART NO.	REQ'D	DESCRIPTION
2	3312189	2	CLAMP-HOSE 2" NOMINAL SS WORM
3	3317917	1	AIR CLEANER-RADIAL SEAL FPG STYLE *Includes Items 3,4 & 5 *
4	3321143	1	ELEMENT-AIR CLEANER, PRIMARY
5	3322572	1	ELEMENT-AIR CLEANER, SAFETY
6	3303991	1	INDICATOR-AIR CLEANER RESTRICTION
*	3343708	1	MOUNTING BAND-AIR CLEANER (No Item Indicator Shown)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

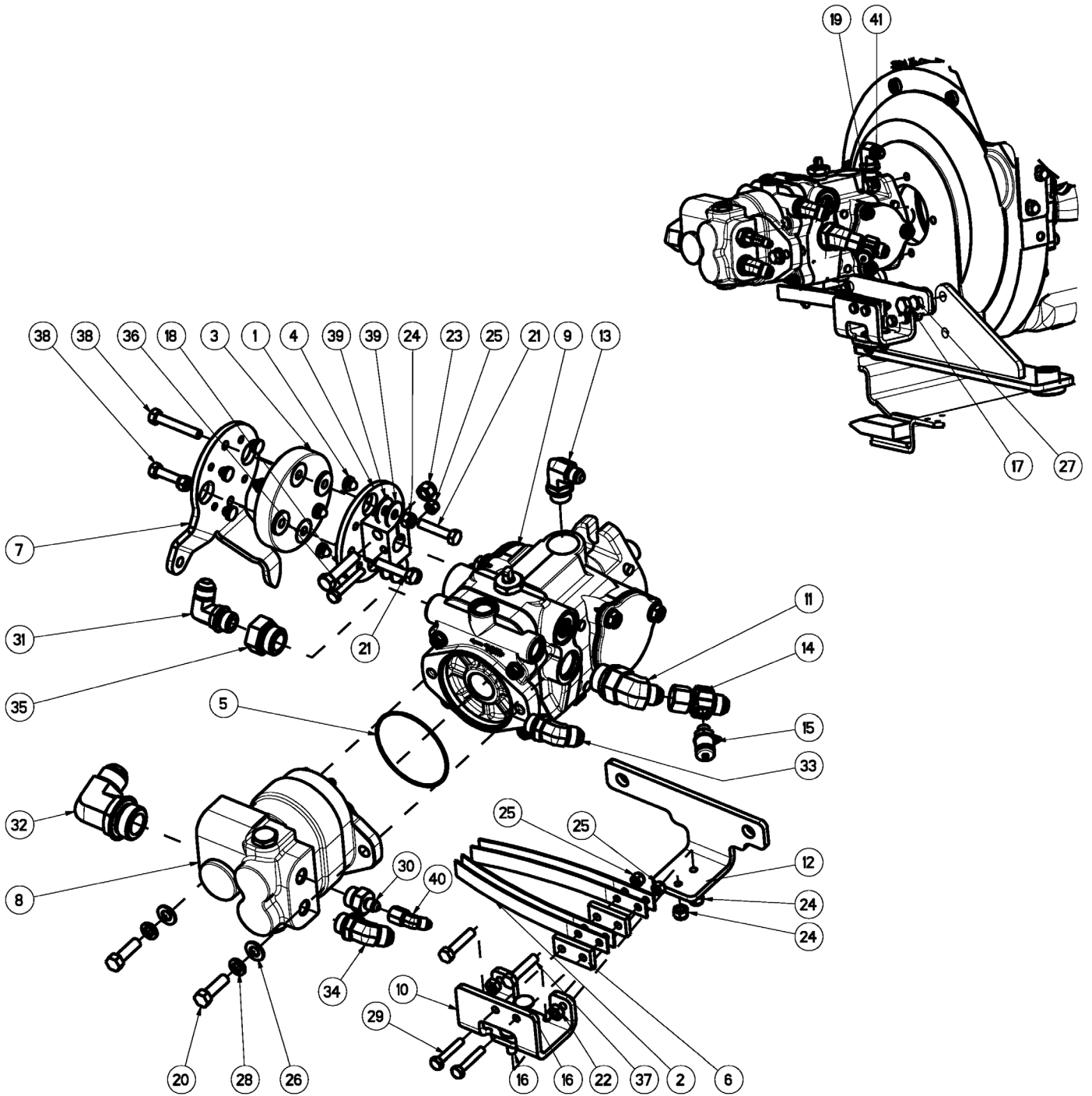
ENGINE GM 1.6L - HYDRAULIC PUMP DETAILS



ENGINE GM 1.6L - HYDRAULIC PUMP DETAILS			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300526	8	BUMPER-RUBBER 1/4 ID X 1/8 THK
2	3300543	4	SPRING-FWD/REV RETURN
3	3301507	1	COUPLING-RUBBER, DIR CONTROL
4	3301544	1	WELD-DISC FWD/REV
5	3303711	1	ORING-STATIC SEAL 3.239 ID
6	3303918	2	SPACER-FWD/REV BRACKET
7	3307219	1	PLT-DIRECTIONAL CONT PLTD
8	3321397	1	PUMP-HYDRAULIC AUX W/FLOW DIR
9	3335072	1	PUMP-PISTON, VARIABLE, 1.44 CID
10	3335301	1	BRACKET - FWD/REV . 9X
11	3335709	1	FTG-45° 1-1/16-12 X 1/2", STR#12-JIC37°#8
12	3335883	1	BRKT-MOUNT, FWD/REV ADJUST
13	3341130	1	FTG-90 3/4-16 TO #6
14	3342204	1	FTG-GAUGE PORT
15	3342205	1	COUPLING-TEST 4 MALE 0-ROMG (7/16-20)
16	3400009	2	SCR-CAR,5/16-18X1.00
17	3400022	2	SCR-HEX,1/2-13X1.25
18	3400027	1	SCR-HEX,3/8-16X1.75
19	3400028	2	SCR-HEX,3/8-16x1.50
20	3400029	2	SCR-HEX, 3/8-16x1.25
21	3400033	2	SCR-HEX,5/16-18X1.50
22	3400069	2	NUT-HEX 5/16-24
23	3400079	1	NUT-HEX 3/8-16 ES
24	3400080	6	NUT-HEX 5/16-18 ES
25	3400081	3	NUT-HEX 1/4-20 ES
26	3400087	2	WASHER-FLAT 3/8 STANDARD
27	3400098	2	WASHER-LOCK 1/2 SPLIT

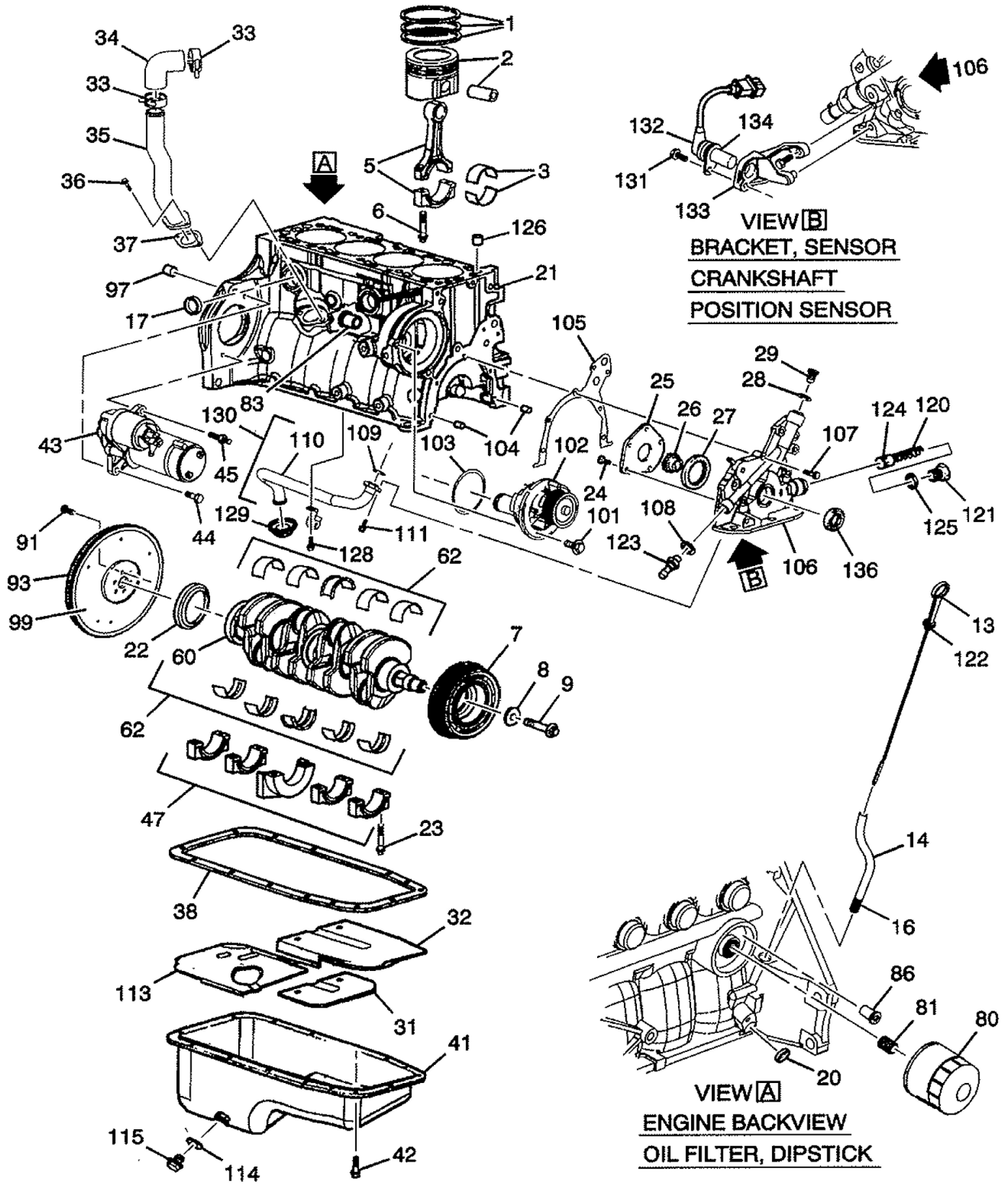
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L - HYDRAULIC PUMP DETAILS (CONTINUED)



ENGINE GM 1.6L - HYDRAULIC PUMP DETAILS (CONTINUED)			
ITEM	PART NO.	REQ'D	DESCRIPTION
28	3400101	2	WASHER-LOCK 3/8 SPLIT
29	3400149	2	SCR-HEX,1/4-20x1.50
30	3400150	1	FTG-STR 3/4-16 TO #4
31	3400154	1	FTG-90 3/4-16 TO #8
32	3400156	1	FTG-90 1 5/16-12 TO #16
33	3400157	1	FTG-45° 3/4-16 TO #8
34	3400158	1	FTG-45° 7/8-14 TO #8
35	3400167	1	FTG-ADAPTER 1 1/6-12 EXT
36	3400173	1	SCR-HEX,1/4-20X1.75
37	3400228	2	SCR-HEX, 5/16-24x1.5 FULL THD
38	3400231	2	SCR-HEX,5/16-18X2.0
39	3400233	4	WASHER-FENDER 5/16 1.00 OD
40	3400248	1	FTG-SWIVEL 45 ELL #4JIC 1/4
41	3400385	2	WASHER-CONICAL SPRING 3/8
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

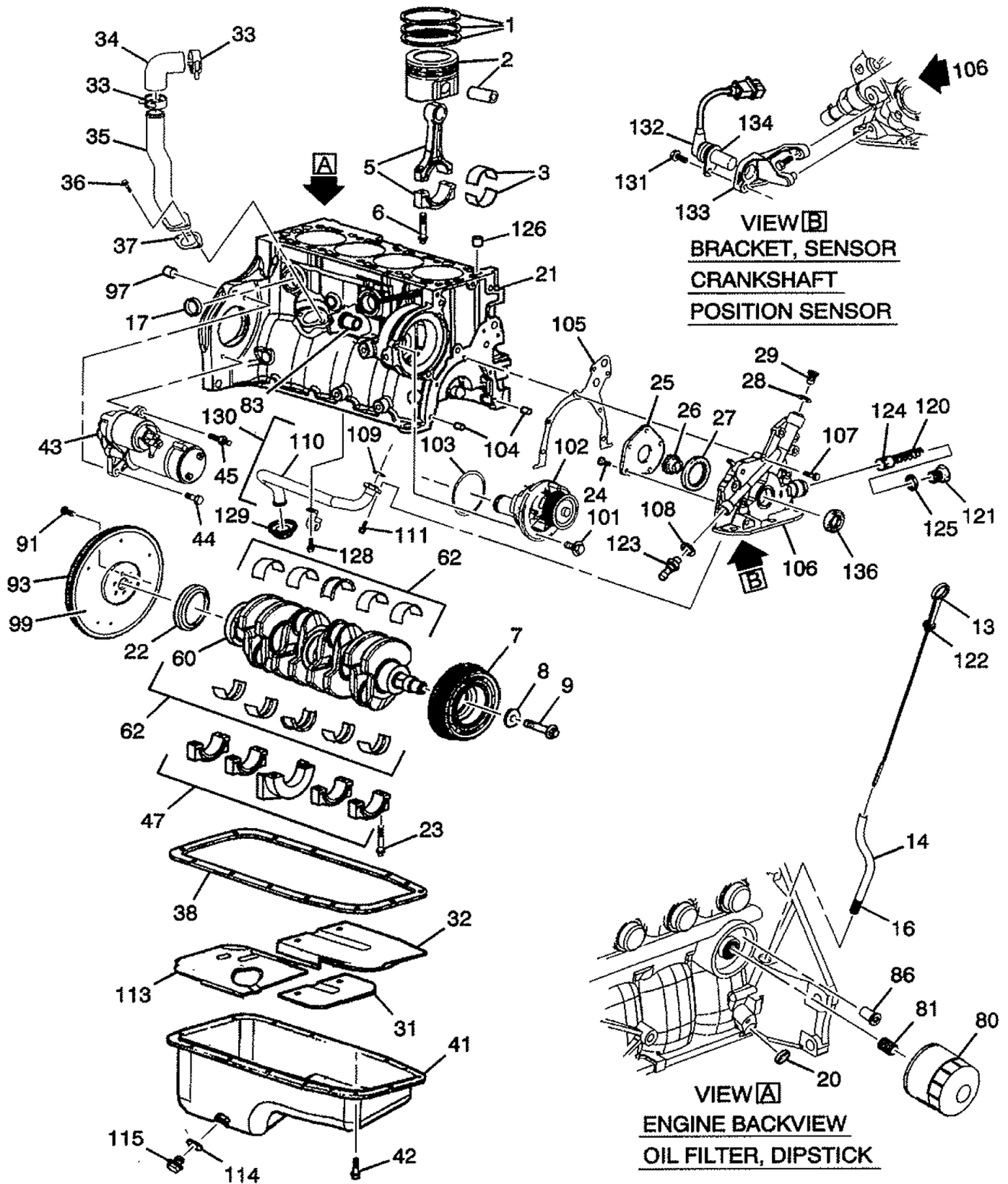
ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 1



ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 1			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3338733	4	RING KIT, PISTON (STD)
2	3338734	1	PISTON W/PIN (STD) (INCLUDES 1,5,6)
3	3338735	1	BEARING KIT, CONNECTING ROD (STD)
5	3338736	1	ROD, CONNECTING
6	3338737	8	BOLT, CONNECTING ROD
7	3342317	1	PULLEY, CRANKSHAFT
8	3338738	1	WASHER, CRANKSHAFT PULLEY
9	3338739	1	BOLT, CRANKSHAFT PULLEY
13	3342318	1	DIPSTICK (INCLUDES 122)
14	3338741	1	TUBE, DIPSTICK
16	3338742	1	SEALER, CAMSHAFT BEARING HOLD PLUG
17	3338743	6	PLUG, ENG BLOCK COOL DRAIN HOLE
20	3338744	1	PLUG, ENG BLOCK CORE HOLE
21	3338745	1	ENGINE, SERVICE
22	3343659	1	SEAL, CRANKSHAFT REAR OIL
23	3338746	10	BOLT, CRANKSHAFT BEARING CAP
24	3338747	5	BOLT, OIL PUMP COVER
25	3338748	1	COVER, OIL PUMP
26	3338749	1	GEAR, OIL PUMP DRIVE
27	3337397	1	GEAR, OIL PUMP DRIVE
28	3342329	1	SEAL, OIL PUMP HOUSING
29	3338750	1	PLUG, OIL PUMP HOUSING
31	--XXX--	-	NOT SOLD SEPARATELY
32	3338754	1	BAFFLE, OIL PAN
33	3338755	2	CLAMP, PCV HOSE
34	3343669	1	HOSE, PCV
35	3338756	1	TUBE, PCV
36	3338757	2	BOLT, PCV TUBE

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

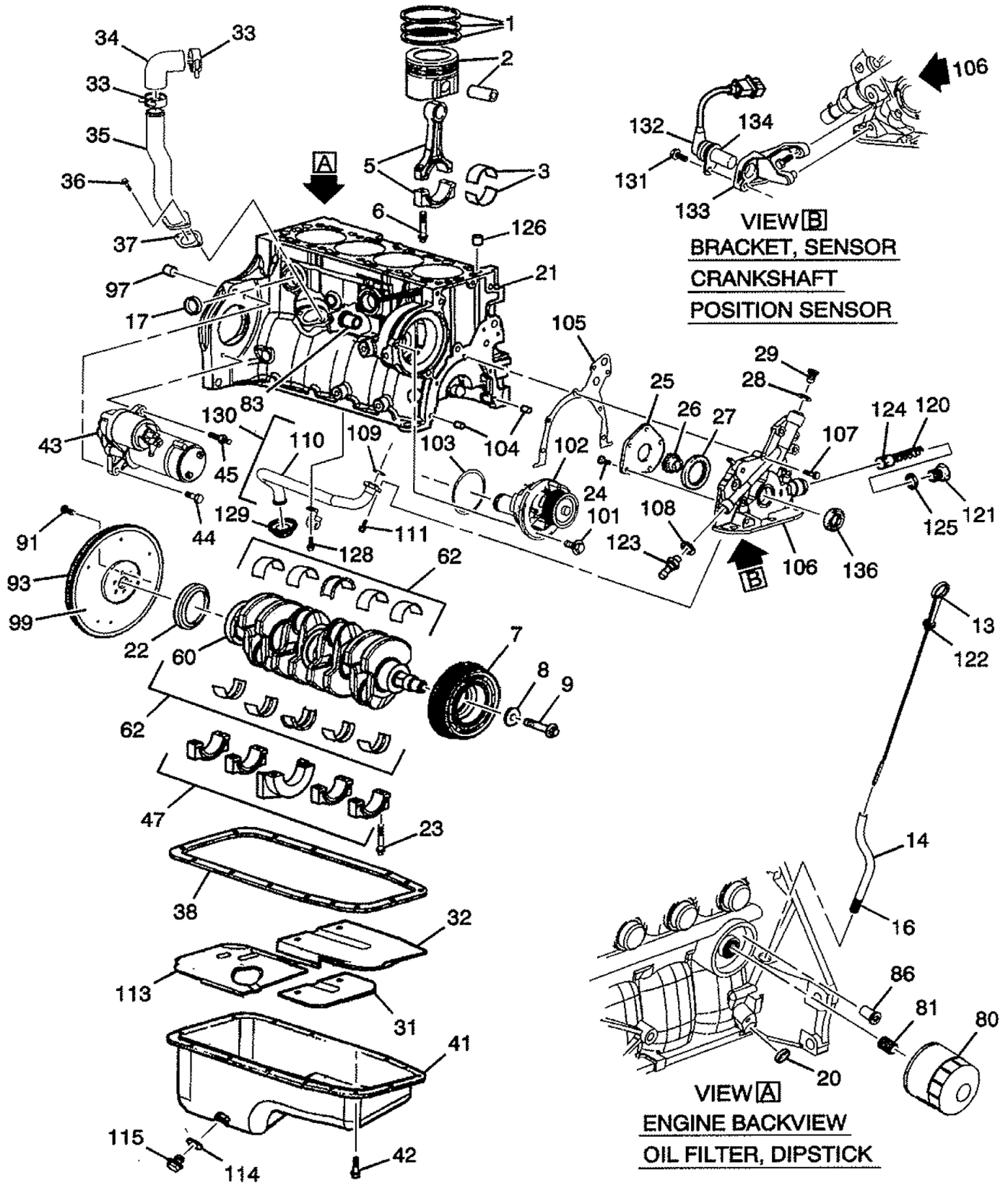
ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 1 (CONTINUED)



**ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 1
 (CONTINUED)**

ITEM	PART NO.	REQ'D	DESCRIPTION
37	3342418	1	GASKET, PCV TUBE
38	3338758	1	GASKET, OIL PAN
41	3343662	1	PAN, OIL (INCLUDES 31,32,113,114,115)
42	3338759	15	BOLT, OIL PAN
43	3336742	1	STARTER (DELCO TYPE)
44	3343613	1	BOLT, STARTER
45	3343612	1	STUD, STARTER
47	--XXX--	-	NOT SOLD SEPARATELY
60	3338760	1	CRANKSHAFT
62	3338761	4	BEAR KIT CRANK POSN#1,2,4,5.25MM GREEN
	3338762	4	BEARING KIT CRANK (POSN#3) (STD BROWN)
	3338763	4	BEAR KIT CRANK POSN#1,2,3,4,5STD BROWN/
	3338764	4	BEAR KIT CRANK POSN#4 .50MM GREEN/BLUE
	3338765	4	BEARING KIT CRANK (POSN#3) (STD GREEN)
	3338766	4	BEAR KIT CRANK POSN# 1,2,4,5STD BRN
66	3338767	1	VALVE, OIL FILTER BYPASS
80	3342201	1	FILTER, OIL
81	3343655	1	FITTING, OIL FITTER
82	3338768	1	SPROCKET, WATER PUMP
91	3338769	6	BOLT, FLYWHEEL
97	3338770	2	PIN, TRANS LOCK
99	3338771	1	FLYWHEEL
101	3338772	3	BOLT, WATER PUMP COVER
102	3343668	1	PUMP KIT, WATER
103	3338773	1	SEAL, WATER PUMP COVER
104	3338774	2	PIN, OIL PUMP HOUSING LOCK
105	3337396	1	GASKET, OIL PUMP
106	3338775	1	PUMP, OIL (INCLUDES: 24,25,26,27,121,125)
107	3338776	6	BOLL. OIL PUMP
108	3338777	1	SEAL, OIL PAN DRAIN PLUG
109	3338778	1	SEAL, OIL PUMP SUE PIPE
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 1 (CONTINUED)

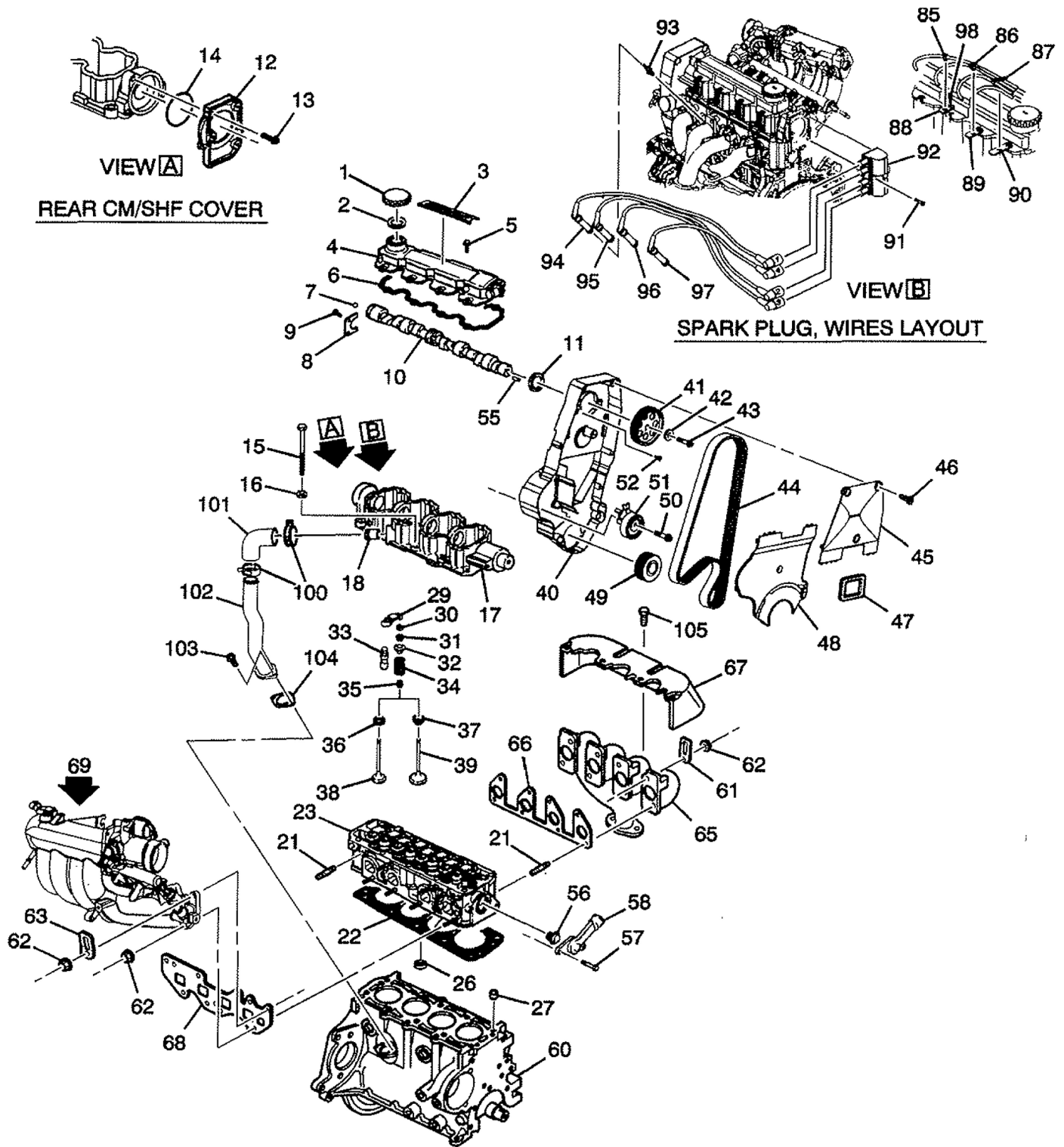


**ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 1
 (CONTINUED)**

ITEM	PART NO.	REQ'D	DESCRIPTION
110	3338779	1	PIPE, OIL PUMP SUE
111	3338780	2	BOLL, OIL PUMP SCREEN
112	3338781	1	BOLT, OIL PUMP SCREEN BRACKET
113	3338782	1	BAFFLE, OIL PAN
	3338783	1	BAFFLE, OIL PAN
114	3338784	1	SEAL, OIL PAN DRAIN PLUG
115	3343651	1	PLUG, OIL PAN DRAIN
120	3338785	1	SPRING. OIL PRESSURE RELIEF VALVE
121	3338786	1	PLUG, OIL PRESSURE RELIEF VALVE BORE
122	3338787	1	SEAL, OIL FILLER CAP
123	3343661	1	SWITCH, ENG OIL PRESSURE INDICATOR
124	3338788	1	VALVE, OIL PRESSURE RELIEF
125	3338789	1	GASKET, OIL PRESSURE RELIEF VALVE BORE PLUG
126	3338790	2	PIN, CAMSHAFT HOUSING LOCK
128	3338791	1	BRACKET, OIL PUMP SCREEN
129	--XXX--	-	NOT SOLD SEPARATELY
130	3338793	1	SCREEN, OIL PUMP (INCLUDES: 110,129)
131	3338794	1	BOLT. CRANKSHAFT POSN SENSOR BRACKET
132	3342351	1	SENSOR, CRANKSHAFT POSN
133	3338795	1	BRACKET, CRANKSHAFT POSN SENSOR LEAD CLIP
134	3338796	3	BOLT, CRANKSHAFT POSN SENSOR
136	3343653	1	SEAL, OIL PUMP

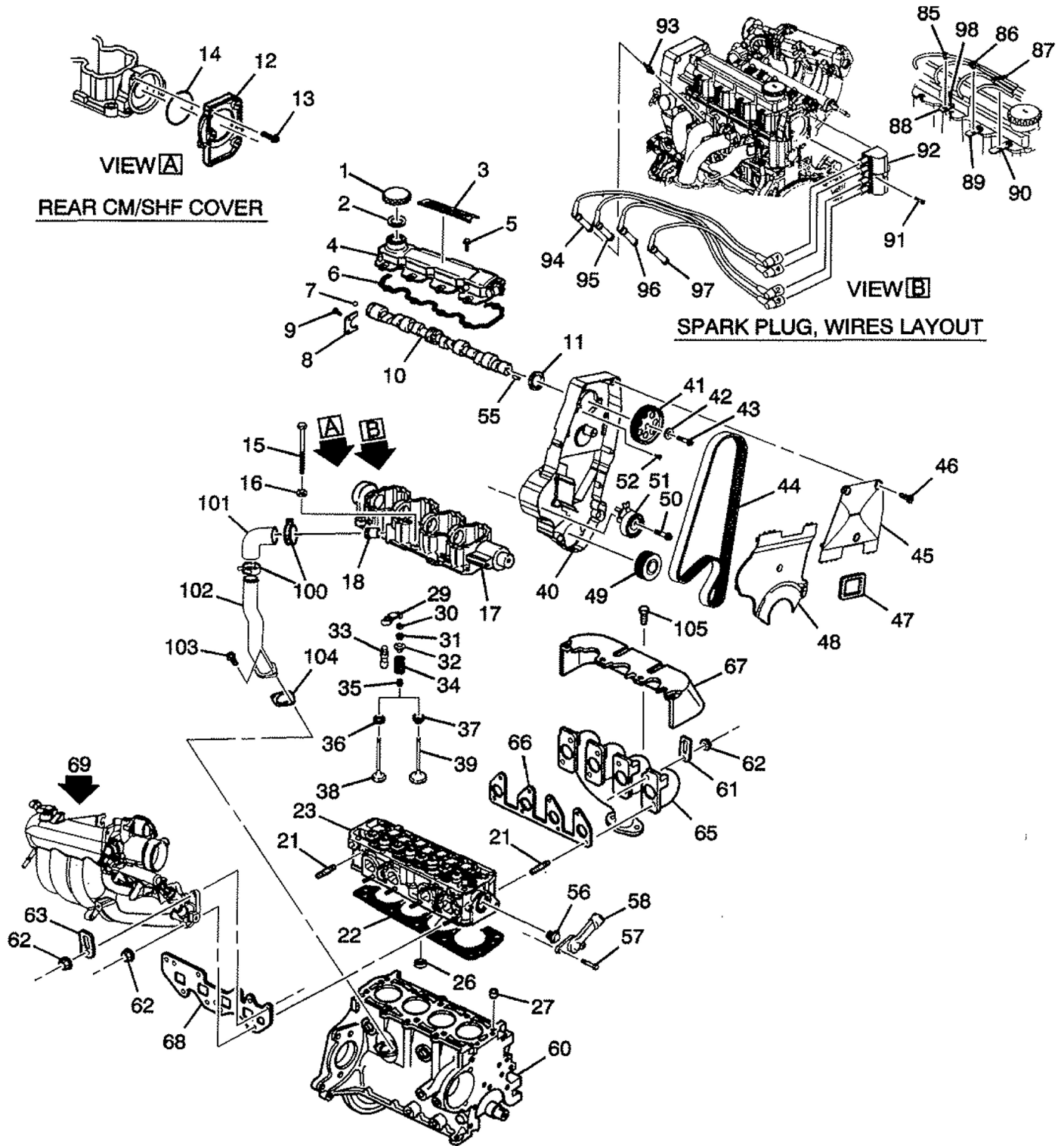
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 2



ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 2			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3342352	1	CAP, OIL FILLER (INCLUDES ITEM 2 SEAL)
2	3338688	1	SEAL, OIL FILLER CAP
3	--XXX--	-	PART OF ITEM 4
4	3342354	1	COVER, CAMSHAFT HOUSING
5	3338689	8	BOLT, OIL
6	3342356	1	GASKET, CAMSHAFT HOUSING COVER
7	3338690	2	BALL. CAMSHAFT OIL RSTR
8	3338691	1	RETAINER, CAMSHAFT
9	3342363	2	BOLT, CAMSHAFT RET.
10	3338692	1	CAMSHAFT (INCLS: 7,55)
11	3342361	1	SEAL, CAMSHAFT
12	3338693	1	COVER, CAMSHAFT HOUSING
13	3338694	3	BOLT, CAMSHAFT REAR COVER
14	3342364	1	SEAL, CAMSHAFT HOUSING COVER BOLT
15	3343658	10	BOLT, CYLINDER HEAD
16	3338695	1	WASHER, CAMSHAFT SPROCKET
17	3338696	1	HOUSING, CAMSHAFT
18	3338697	1	TUBE. PCV
21	3342368	5	STUD, INTAKE MANIFOLD
22	3342365	1	GASKET KIT. CYLINDER HEAD
23	3343660	1	HEAD. CYLINDER
26	3343664	1	SEAT-GM 1.6L EXHAUST VALVE
	3343665	1	SEAT-GM 1.6L EXHAUST VALVE (0.2 MM OS)
	3343666	1	SEAT-GM 1.6L EXHAUST VALVE (0.4 MM OS)
	3343667	1	SEAT-GM 1.6L EXHAUST VALVE
27	3338698	2	PIN, CAMSHAFT HOUSING LOCK
29	3342371	4	ARM, VALVE ROCKER
30	3338699	8	SEAT, VALVE ROCKER ARM VALVE
	3338700	8	SEAT VALVE ROCKER ARM VALVE CUP SHAPE 1
31	3343663	16	KEY, VALVE STEM
32	3342374	4	CAP, VALVE SPRING
33	3338701	8	ADJUSTER, HYDRAULIC VALVE LASH
34	3338702	8	SPRING, VALVE (INTAKE AND EXHAUST)
35	3343670	8	SEAL, VALVE STEM OIL
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 2 (CONTINUED)

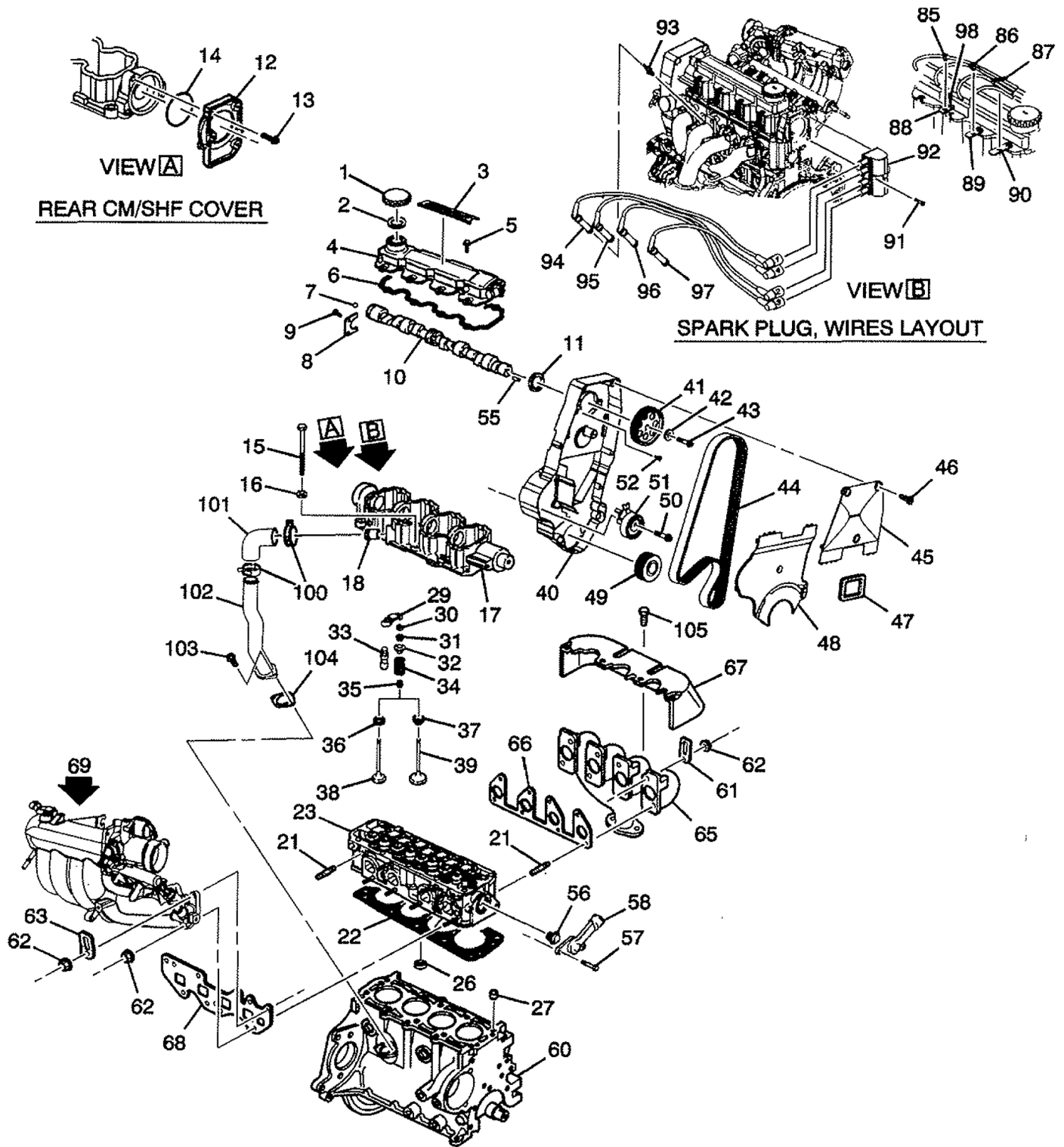


**ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 2
 (CONTINUED)**

ITEM	PART NO.	REQ'D	DESCRIPTION
37	3338704	8	SEAT, VALVE ROCKER ARM VALVE
	3338705	8	SEAT. VALVE ROCKER ARM VALVE (CUP SHAPE 19X29X7)
38	3342379	4	VALVE, EXHAUST
39	3342380	1	VALVE, INTAKE
40	3343656	1	COVER, TIMING BELT FRONT
41	3342382	1	SPROCKET, CAMSHAFT
42	3338706	1	WASHER, CAMSHAFT SPROCKET
43	3338707	1	BOLL, CAMSHAFT SPROCKET
44	3342385	1	BELT, TIMING (111 TEETH)
45	3342389	1	COVER, TIMING BELT FRONT
46	3338708	6	BOLT, ENG FRONT COVER
48	3342386	1	COVER, TIMING BELT FRONT
49	3343650	1	SPROCKET, CRANKSHAFT
50	3338709	1	BOLL, CAMSHAFT SPROCKET
51	3338710	1	TENSIONER, TIMING BELT
52	3338711	4	BOLT, TIMING BELT REAR COVER
55	3338712	2	PIN, CAMSHAFT HOUSING LOCK
56	3342394	1	THERMOSTAT {INCLS: 58}
57	3338714	2	BOLT, GENERATOR FRONT BRACKET
58	--XXX--	-	PART OF ITEM 56
60	3338716	1	ENGINE
62	3338717	8	NUT, INTAKE MANIFOLD
65	3343657	1	MANIFOLD, EXHAUST
66	3343652	1	GASKET, EXHAUST MANIFOLD
67	3343864	1	SHIELD, EXHAUST MANIFOLD
68	3343654	1	GASKET, INTAKE MANIFOLD
69	3343645	1	INTAKE MANIFOLD
85	3338720	1	RETAINER, SPARK PLUG WIRE HARNESS
86	3338721	1	RETAINER, SPARK PLUG WIRE HARNESS
87	3338722	1	RETAINER, SPARK PLUG WIRE HARNESS
88	3338723	1	BRACKET, SPARK PLUG WIRE RET
89	3338724	1	BRACKET, SPARK PLUG WIRE RET
90	3338725	1	BRACKET, SPARK PLUG WIRE RET

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 2 (CONTINUED)

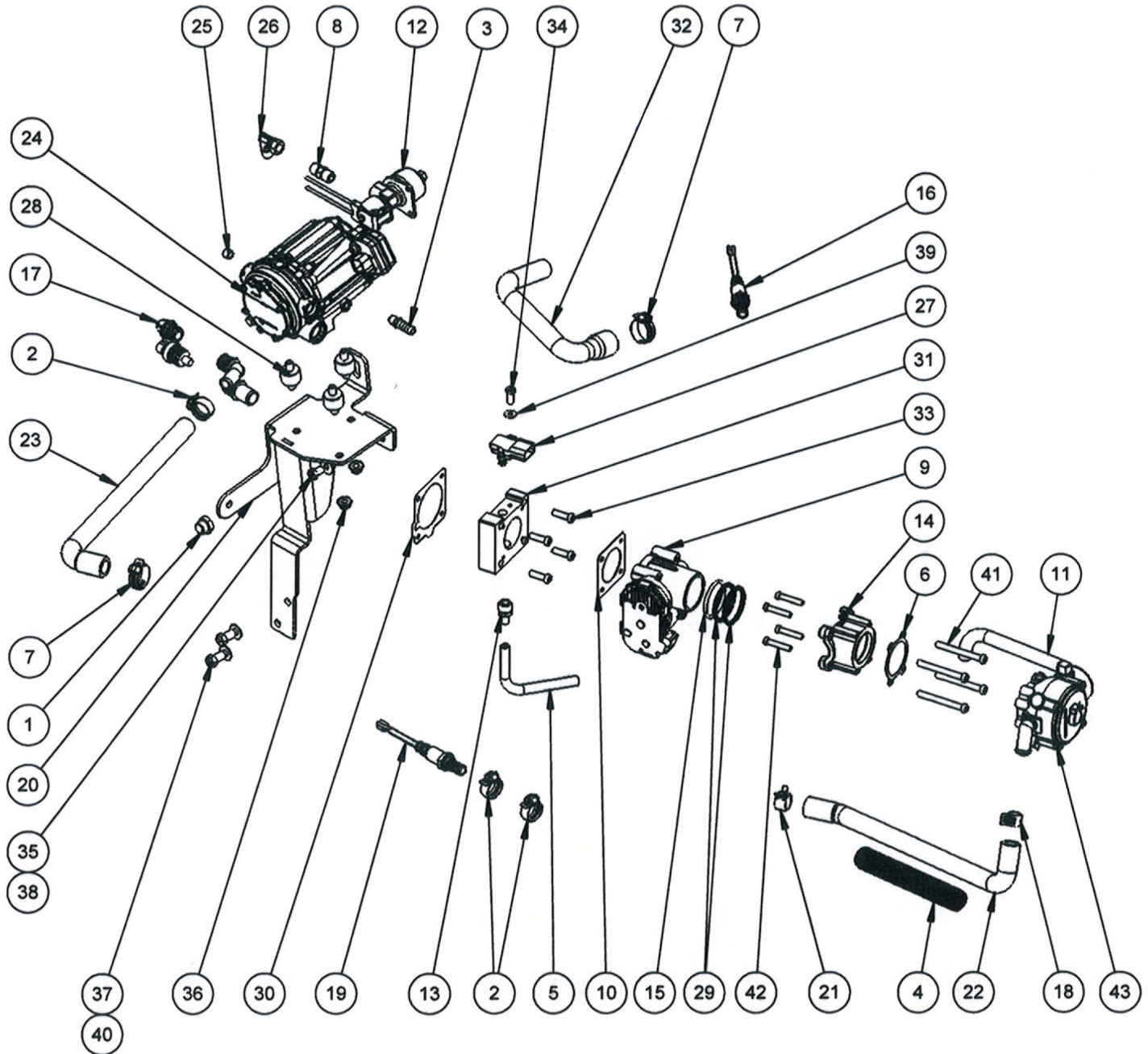


**ENGINE GM 1.6L - ENGINE COMPONENT BREAKDOWN ILLUSTRATION 2
 (CONTINUED)**

ITEM	PART NO.	REQ'D	DESCRIPTION
91	3338726	3	BOLT, IGNITION COIL BRACKET
92	3342408	1	COIL, IGNITION
93	3342409	4	SPARK PLUG
94	3342410	1	WIRE, SPARK PLUG CYLINDER #1 (435MM)
95	3342411	1	WIRE, SPARK PLUG CYLINDER #2 (365MM)
96	3342412	1	WIRE, SPARK PLUG CYLINDER #3 (275MM)
97	3342413	1	WIRE, SPARK PLUG CYLINDER #4 (185MM)
98	3338727	3	BOLT, IGNITION COIL BRACKET
100	3338728	2	CLAMP, PCV HOSE
101	3338729	1	HOSE, PCV
102	3338730	1	TUBE, PCV
103	3338731	2	BOLT, PCV TUBE
104	3338732	1	GASKET, PCV TUBE

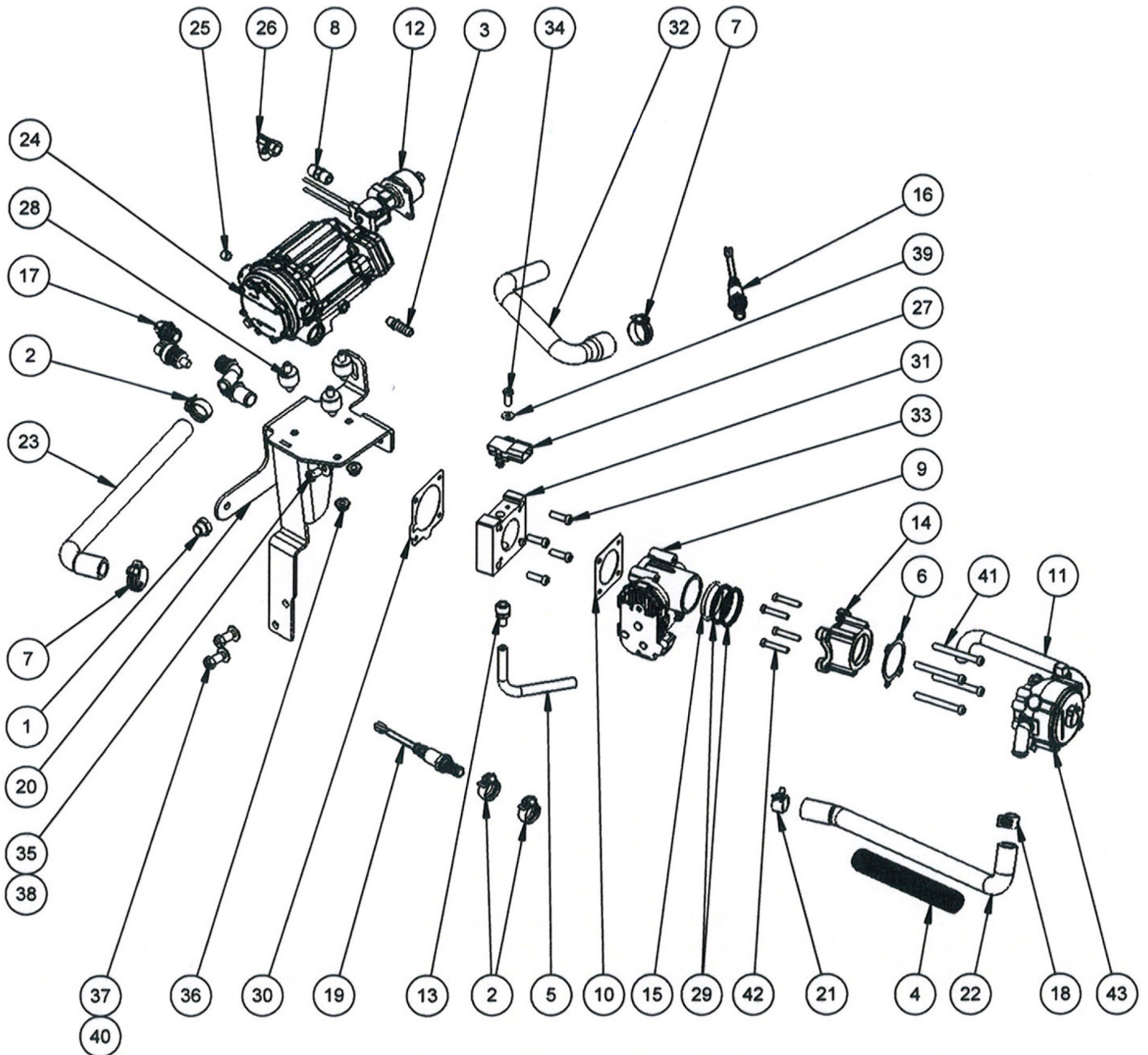
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

ENGINE GM 1.6L - LPG FUEL SYSTEM T3



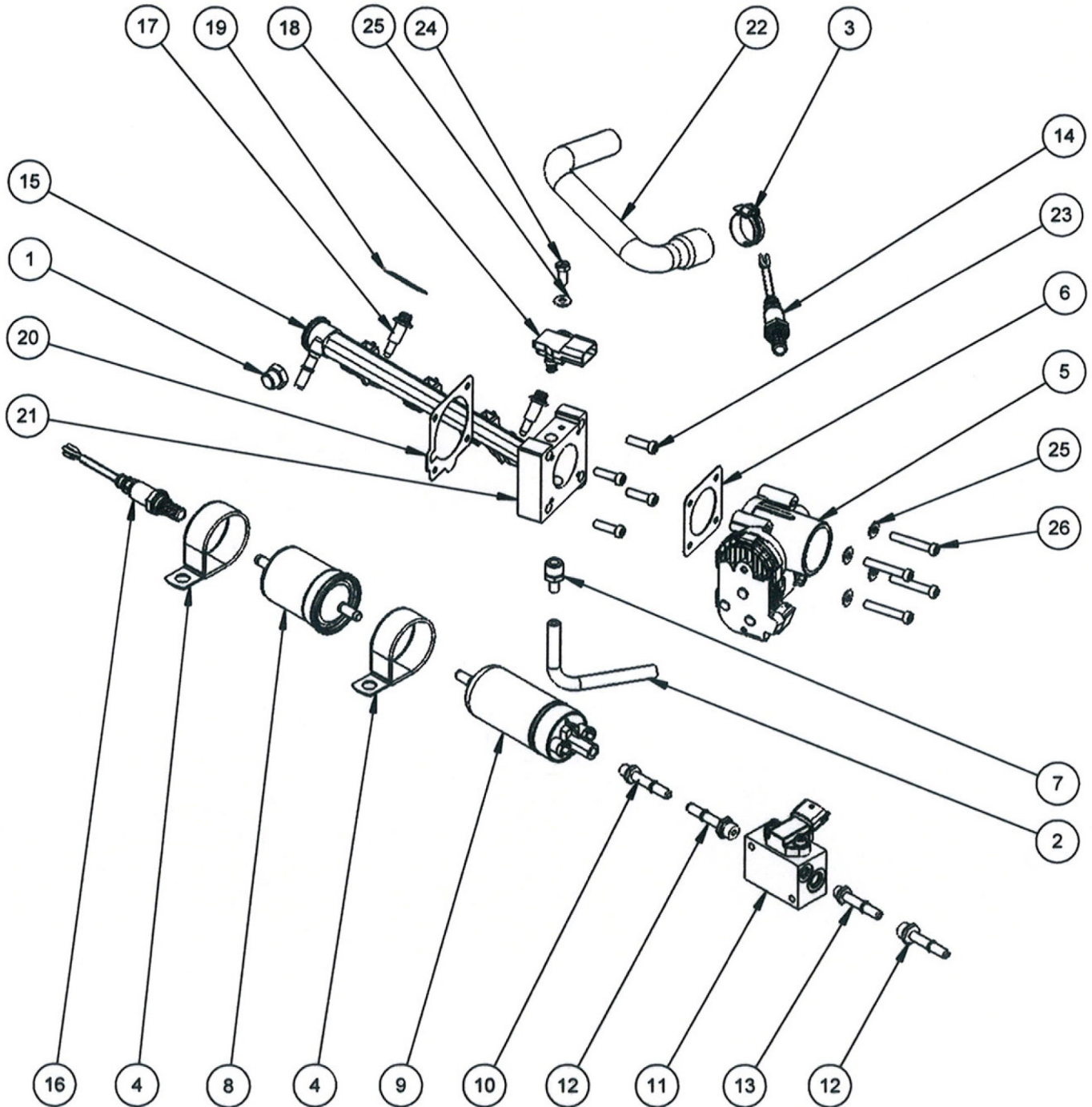
ENGINE GM 1.6L - LPG FUEL SYSTEM T3			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3339831	1	PLUG-M16 INT MAN GM GAS/LP
2	3339843	3	CLAMP-WORM DRV 1/2" WIDTH HOSE CLAMP
3	3339844	1	FTG-1/8MPT X 3/8 HOSE BARB GM LP
4	3339845	12	LOOM-SPLIT 1" GM LP PER INCH
5	3339832	1	HOSE-VACUUM 7/32" GM GAS/LP
6	3339846	1	GASKET-ADAPTER GM LP
7	3339833	2	CLAMP-WORM DRV 1/2" WD SAE 12 11/16 TO 1
8	3339847	1	NIPPLE-1/4 NPT X 1-3/8 HEX GM LP
9	3343627	1	THROTTLE BODY-GM 1.6L BOSCH 40MM
10	3339834	1	GASKET-4 BOLT, TB GM GAS/LP
11	3339848	1	HOSE-FUEL 3/8 DIA. GM LP
12	3343505	1	FUEL LOCK- LPG W/FILTER
13	3339835	1	FTG-VAC M16-1.5-6H GM GAS/LP
14	3339850	1	ADAPTER- GM LP
15	3339851	1	O-RING-MXR ADPTR 40MM/100 GM LP
16	3343630	1	SENSOR-GM 1.6L 02 POST CAT
17	3339852	2	FTG-KIT, EPR GM LP
18	3339853	1	CLAMP-5/8 HOSE (SPRING TYPE) GM LP
19	3343630	1	SENSOR-GM 1.6L 02 POST CAT
20	3339854	1	BRKT-WDT REGULATOR MOUNT GM LP
21	3339855	1	CLAMP-3/4 HOSE (SPRING TYPE) GM LP
22	3339856	1	HOSE-MOLDED FUEL GM T2 LP
23	3339857	1	HOSE-MOLDED FUEL GM T2 LP #2
24	3343632	1	REGULATOR-GM 1.6L ELEC PRESS
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L - LPG FUEL SYSTEM T3 (CONTINUED)



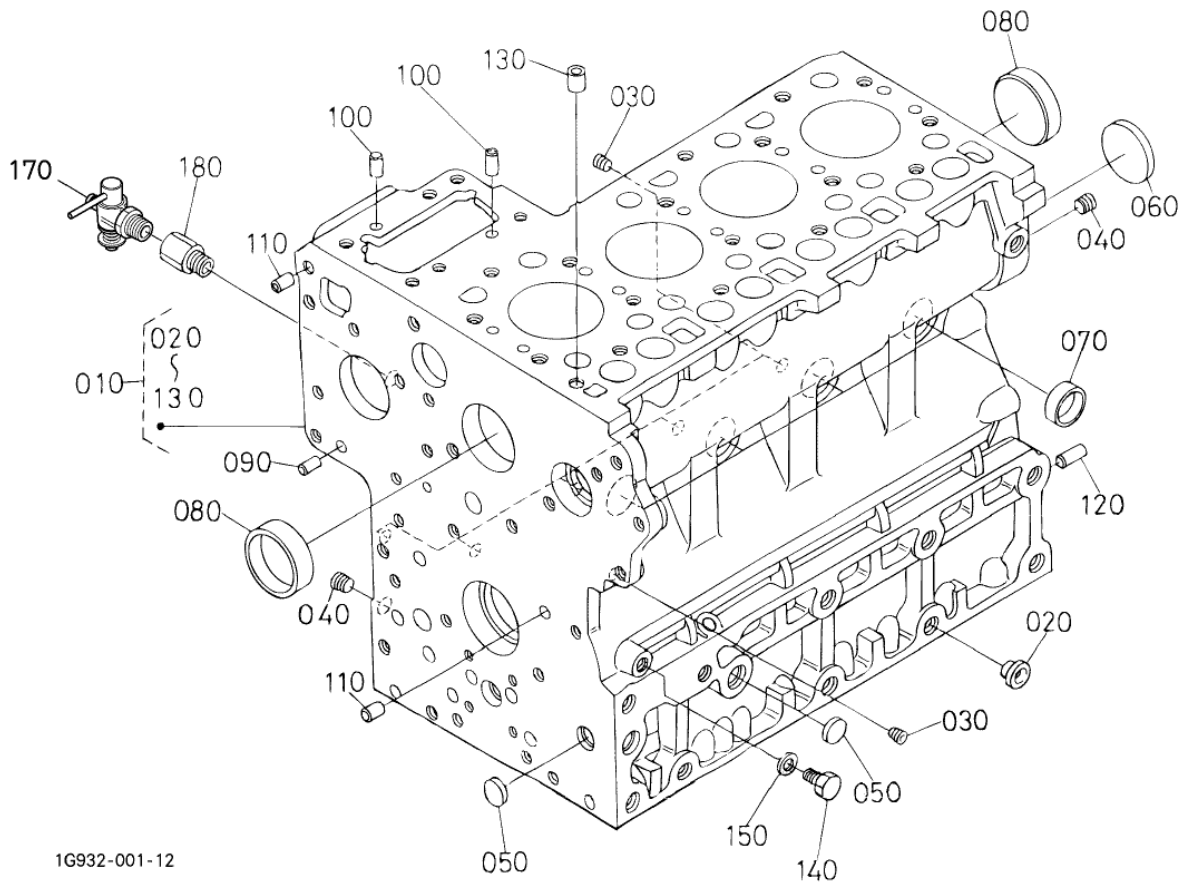
ENGINE GM 1.6L - LPG FUEL SYSTEM T3 (CONTINUED)			
ITEM	PART NO.	REQ'D	DESCRIPTION
25	3339859	1	PLUG GM LP
26	3339860	1	FTG CONNECTOR GM T2 LP
27	3343636	1	SENSOR-GM 1.6L T MAP
28	3339861	3	ISOLATOR-EPR GM LP
29	3339862	1	SEAL-QUAD MXR ADPTR 40MM/100 GM LP
30	3339837	1	GASKET-INT MAN/ADAP GM GAS/LP
31	3339838	1	ADAP-INTAKE/THROTTLE BODY GM GAS/LP
32	3339839	1	HOSE-BREATHER GM GAS/LP
33	3339840	4	BOLT
34	3339841	1	BOLT
35	3339863	1	BOLT
36	3339864	1	NUT
37	3339865	1	BOLT
38	3339866	1	WASHER
39	3339842	1	WASHER
40	3339867	1	WASHER
41	3339868	4	BOLT
42	3339869	4	BOLT
43	3337902	1	MIXER UNIT - GM 1.6L
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

ENGINE GM 1.6L - GASOLINE FUEL SYSTEM T3



ENGINE GM 1.6L - GASOLINE FUEL SYSTEM T3			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3339831	1	PLUG-M16 INT MAN GM
2	3339832	12	HOSE-VACUUM 7/32" GM
3	3339833	1	CLAMP-WORM DRV 1/2" WD SAE 12 11/16 TO 1
4	3339821	2	CLAMP-2.25" GM
5	3343627	1	THROTTLE BODY-GM 1.6L BOSCH 40MM (SP)
6	3339834	1	GASKET-4 BOLT, TB GM
7	3339835	1	FTG-VAC M16-1.5-6H GM
8	3342209	1	FILTER-FUEL GM 1.6/3.0
9	3343536	1	PUMP-FUEL GM 1.6L & GM3.0
10	3339823	1	FTG-FIT & GASKET FUEL PUMP GM
11	3339824	1	MANIFOLD-FUEL TEMP/RETURN GM
12	3339825	2	FTG-(-6) STOR 5/16 SAE J2044 GM
13	3339826	1	FTG-(-3) STOR 5-16 SAE J2044 GM
14	3343630	1	SENSOR-GM 1.6L 02 POST CAT
15	3343815	1	RAIL-FUEL T3 GAS ENGINE CERTIFIED PLST
16	3343630	1	SENSOR-GM 1.6L 02 POST CAT
17	3339828	2	BOLT-SPECIAL FUEL RAIL GM
18	3343636	1	SENSOR-GM 1.6L T MAP
19	--XXX--	-	NOT SOLD SEPARATELY
20	3339837	1	GASKET-INT MAN/ADAP GM
21	3339838	1	ADAP-INTAKE/THROTTLE BODY GM
22	3339839	1	HOSE-BREATHER GM
23	3339840	4	BOLT-M6 X 1.0 X 25 SKT HD BOLT GR 12.9 V
24	3339841	1	BOLT-1/4-20 X 3/4 HX HD BOLT GR5 GM
25	3339842	4	WASHER-1/4 FLAT WASHER HARDENED
26	3339830	4	SCR-M6 X 1.0 X 45 SKT HD GM
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

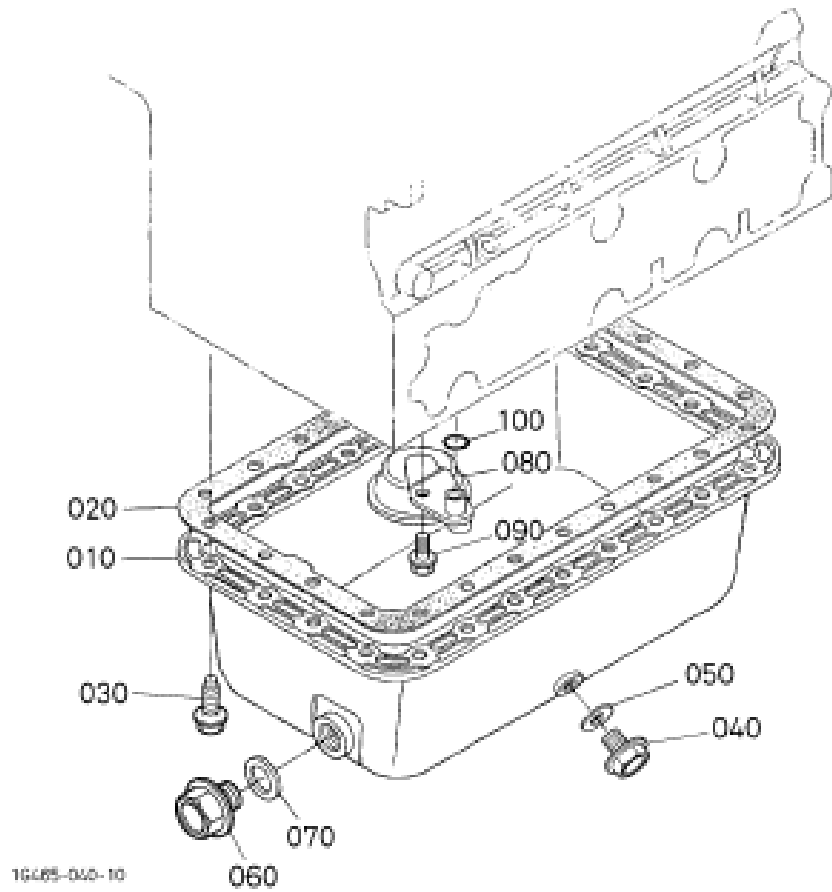
2203 KUBOTA ENGINE BLOCK ASSY



1G932-001-12

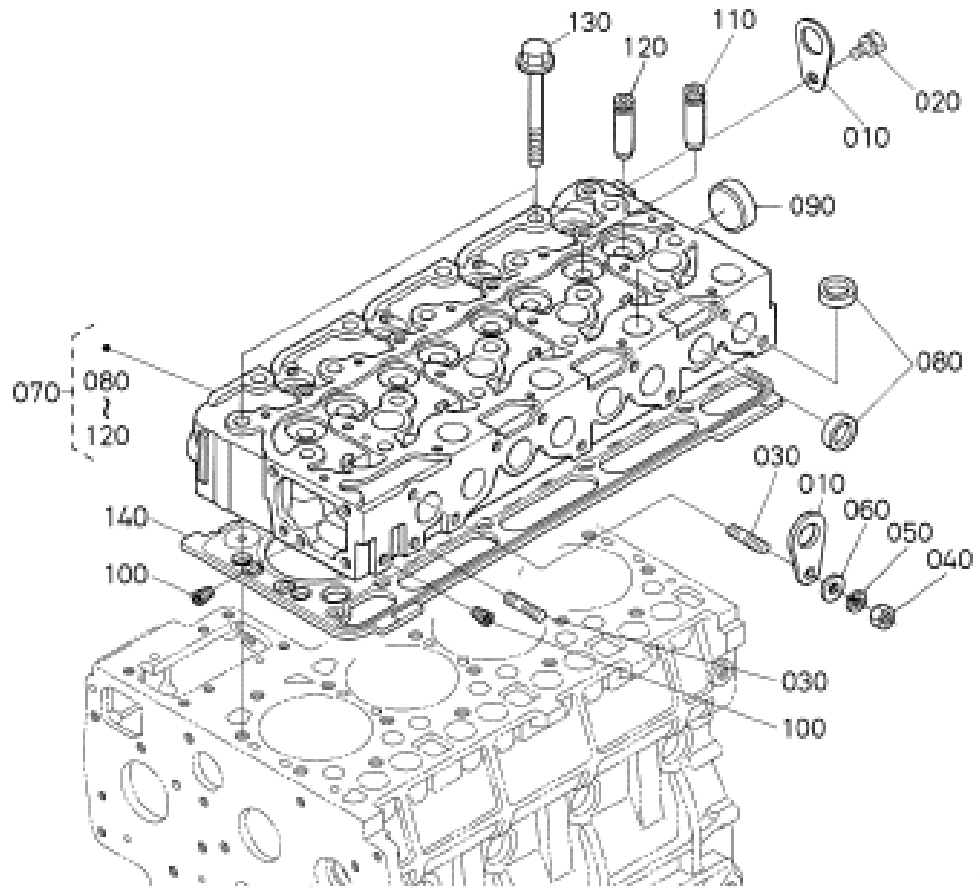
2203 KUBOTA ENGINE BLOCK ASSY			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338322	1	COMP.CRANKCASE
020	3331581	2	PLUG-260
030	3331556	6	PLUG-20
040	3331557	2	PLUG-030
050	3331558	3	PLUG-040
060	3338323	1	PLUG,EXPANSION
070	3331560	6	CAP, SEALING -060
080	3331561	2	CAP, SEALING-070
090	3331562	2	PIN, STRAIGHT-080
100	3331563	3	PIN, STRAIGHT-090
110	3331564	2	PIN, STRAIGHT-100
120	3331565	1	PIN, STRAIGHT-110
130	3331566	1	PIN, PIPE-120
140	3338324	1	PLUG
150	3331569	1	GASKET-150
160	BLANK	-	NOT USED
170	3331567	1	COCK, DRAIN-130
180	3331579	1	JOINT, DRAIN COCK-240
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE OIL PAN



2203 KUBOTA ENGINE OIL PAN			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3303922	1	PAN-OIL KUBOTA (SP)
020	3338325	1	GASKET-OIL PAN
030	3338326	24	BOLT-FLANGE
040	3338327	1	PLUG-DRAIN
050	3338328	1	GASKET-OIL PAN
060	3331591	1	PLUG, DRAIN-090
070	3305252	1	WASHER-KUBOTA OIL DRAIN FTG
080	3331588	1	FILTER, OIL-060
090	3338329	1	BOLT-FLANGE
100	3338330	1	O-RING
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

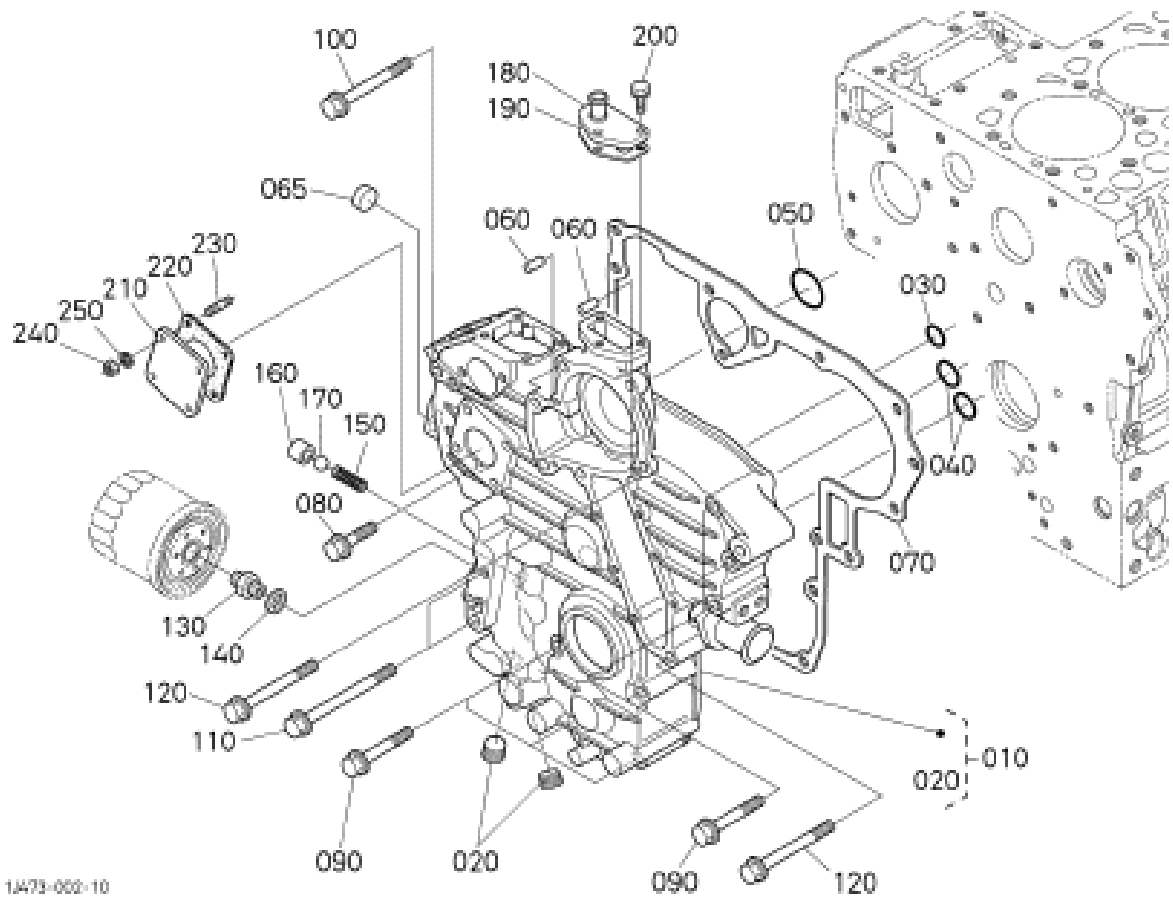
2203 KUBOTA ENGINE CYLINDER HEAD



1/664-002-10

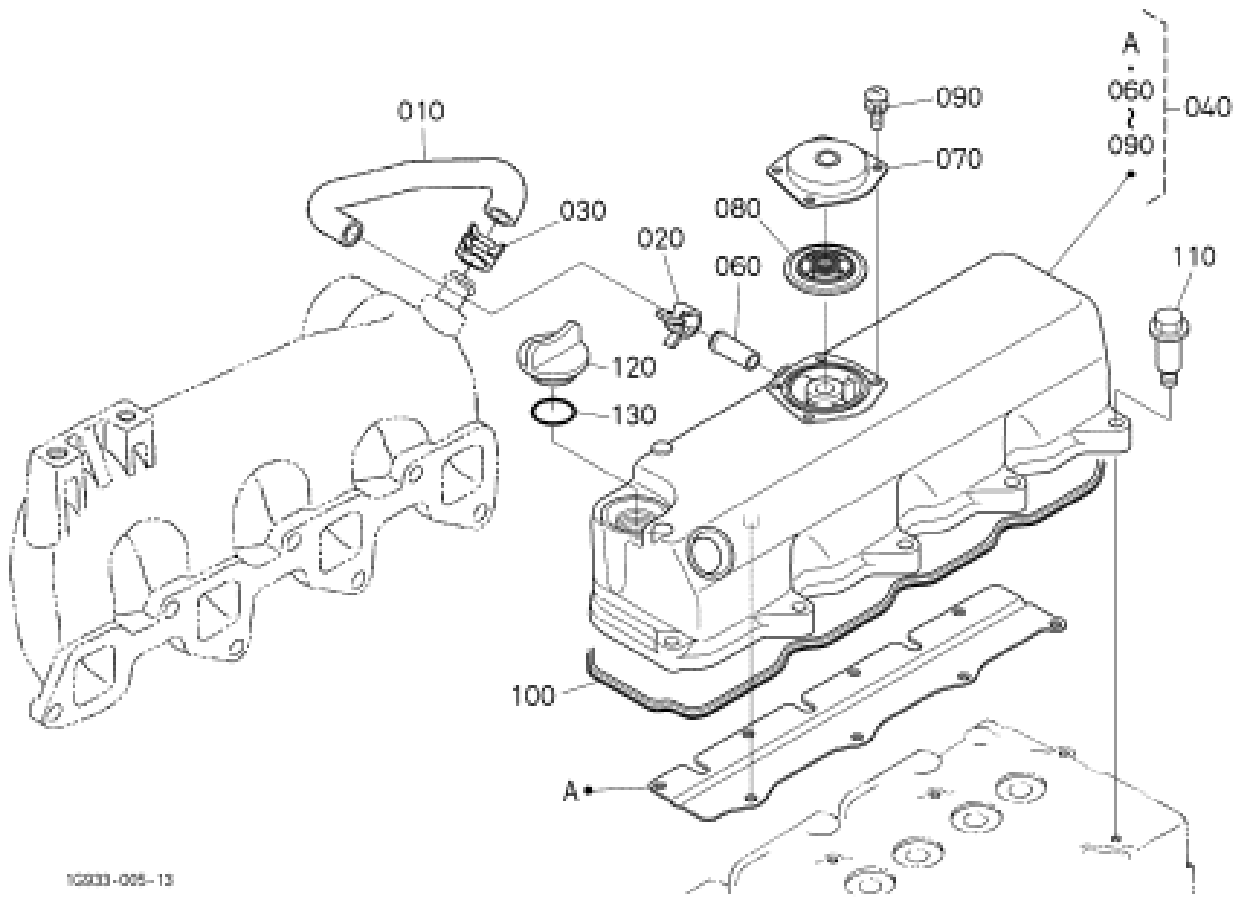
2203 KUBOTA ENGINE CYLINDER HEAD			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3331593	2	HOOK, ENGINE -010
020	3331595	1	BOLT-030
030	3331596	2	STUD-040
040	3331597	1	NUT-050
050	3338331	1	WASHER-SPRING
060	3331599	1	WASHER, PLAIN -070
070	3334291	1	CYL HEAD COMPLETE KBA 2203 EMIS COMP
080	3331603	12	CAP, SEALING-090
090	3331604	1	CAP, SEALING-100
100	3331605	2	PLUG-110
110	3331606	4	GUIDE, INLET VALVE -120
120	3338332	4	GUIDE-VALVE EXHAUST
130	3331608	18	BOLT, CYLINDER HEAD -140
140	3338333	1	GASKET-CYLINDER HEAD (1.15 MM)
140	3334292	1	GASKET-CYL HEAD KBA 2203 EMIS COMP (1.20 MM)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE GEAR CASE



2203 KUBOTA ENGINE GEAR CASE			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3334299	1	GEAR CASE COMPLETE KBA 2203 EMIS COMP
020	--XXX--	-	NOT SOLD SEPARATELY
030	3338334	1	O-RING
040	3338335	2	O-RING
050	3338336	1	O-RING
060	3331564	2	PIN, STRAIGHT-100
065	3334300	1	PLUG-WELCH KBA 2203 EMIS COMP
070	3334301	1	GASKET-TIMING GEAR CASE KBA 2203 EMIS
080	3338337	1	BOLT-FLANGE
090	3338338	7	BOLT-FLANGE
100	3338339	1	BOLT-FLANGE
110	3338340	2	BOLT-FLANGE
120	3338341	4	BOLT-FLANGE
130	--XXX--	-	NOT SOLD SEPARATELY
140	--XXX--	-	NOT SOLD SEPARATELY
150	3331546	1	BURNER- ELBOW
160	3331647	1	SEAT, VALVE-200
170	3331648	1	BALL-210
180	3331649	1	FLANGE, WATER RETURN-220
190	3338342	1	GASKET-RETURN FLANGE
200	3331652	3	BOLT-240
210	3331621	1	COVER-340
220	3338343	1	GASKET-HOUR METER
230	3331624	4	STUD-360
240	3331620	4	NUT-330
250	3331575	4	WASHER, SPRING -200
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

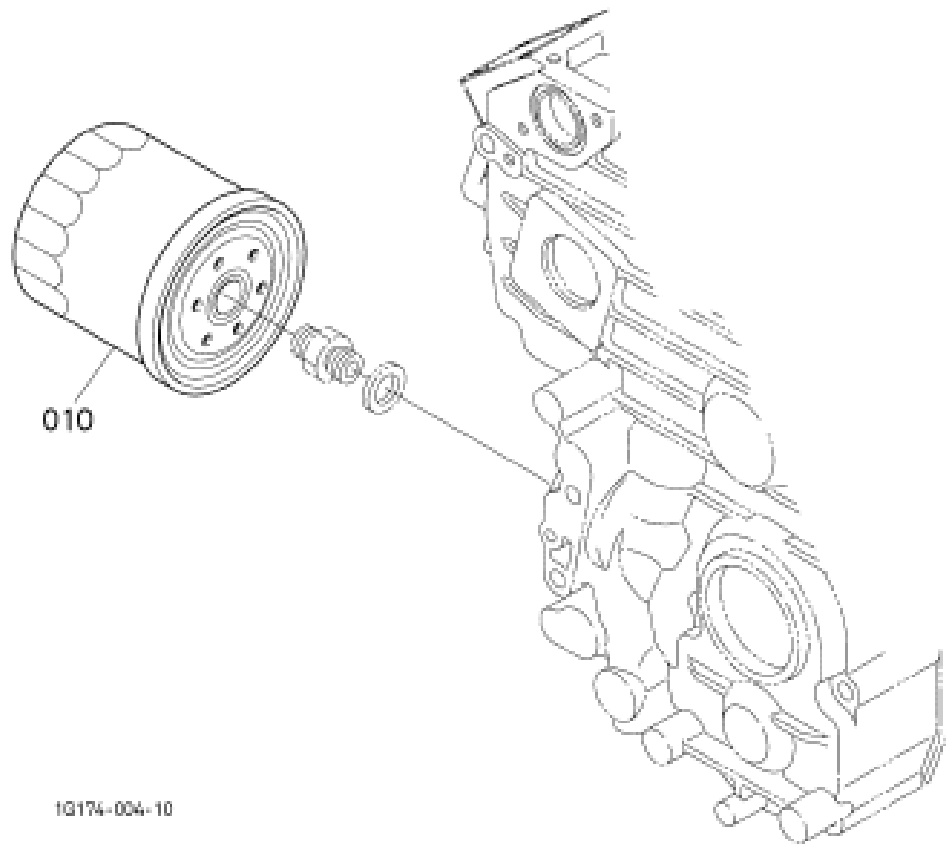
2203 KUBOTA ENGINE HEAD COVER



1G2333-005-13

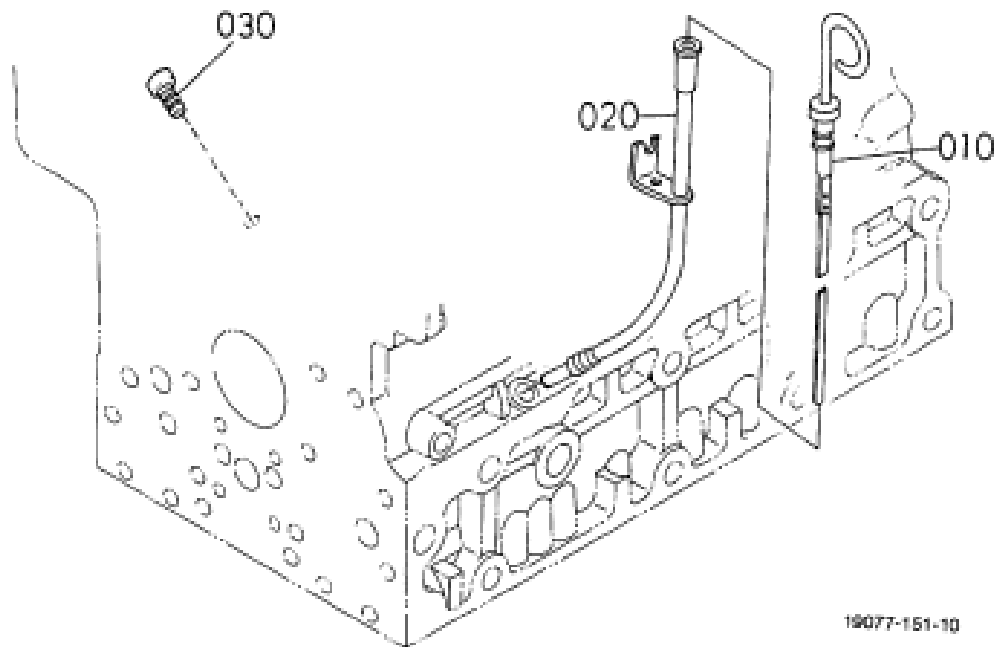
2203 KUBOTA ENGINE HEAD COVER			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3334282	1	TUBE-BREATHER KBA 2203 EMIS COMP
020	3334283	1	CLAMP-BREATHER TUBE KBA 2203 EMIS COMP
030	3334284	1	CLAMP-BREATHER TUBE KBA 2203 EMIS COMP
040	3334285	1	COVER-CYL HEAD KBA 2203 EMIS COMP
050	BLANK	-	NOT USED
060	3332027	1	PIPE WATER RETURN -020
070	3334287	1	COVER-BREATHER KBA 2203 EMIS COMP
080	3334288	1	BREATHER-VALVE COMPLETE KBA 2203 EMIS COMP
090	3338344	4	SCREW- WITH WASHER
100	3334289	1	GASKET-CYL HEAD COVER KBA 2203 EMIS COMP
110	3334290	10	BOLT-CYL HEAD COVER KBA 2203 EMIS COMP
120	PBK15852- 33140	1	PLUG-OIL HEAD COVER
130	3338345	1	O-RING
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE OIL FILTER



2203 KUBOTA ENGINE OIL FILTER			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3331667	1	CARTRIDGE, OIL FILTER -010
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

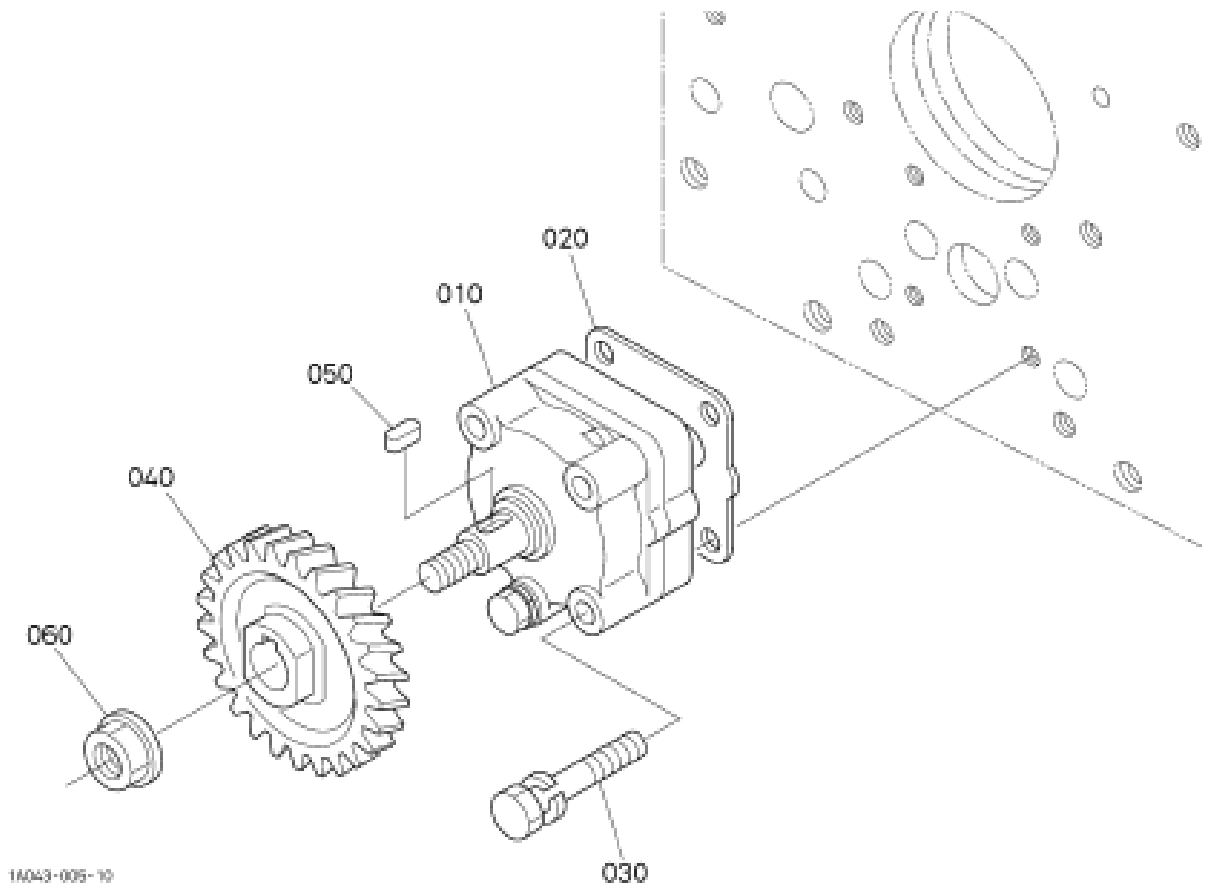
2203 KUBOTA ENGINE DIPSTICK AND GUIDE



19077-151-10

2203 KUBOTA ENGINE DIPSTICK AND GUIDE			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338346	1	GAUGE-OIL
020	3329916	1	V2203-KUBOTA TUBE DIPSTICK(SP)
030	3336926	1	PLUG, OIL GAUGE KUBOTA
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

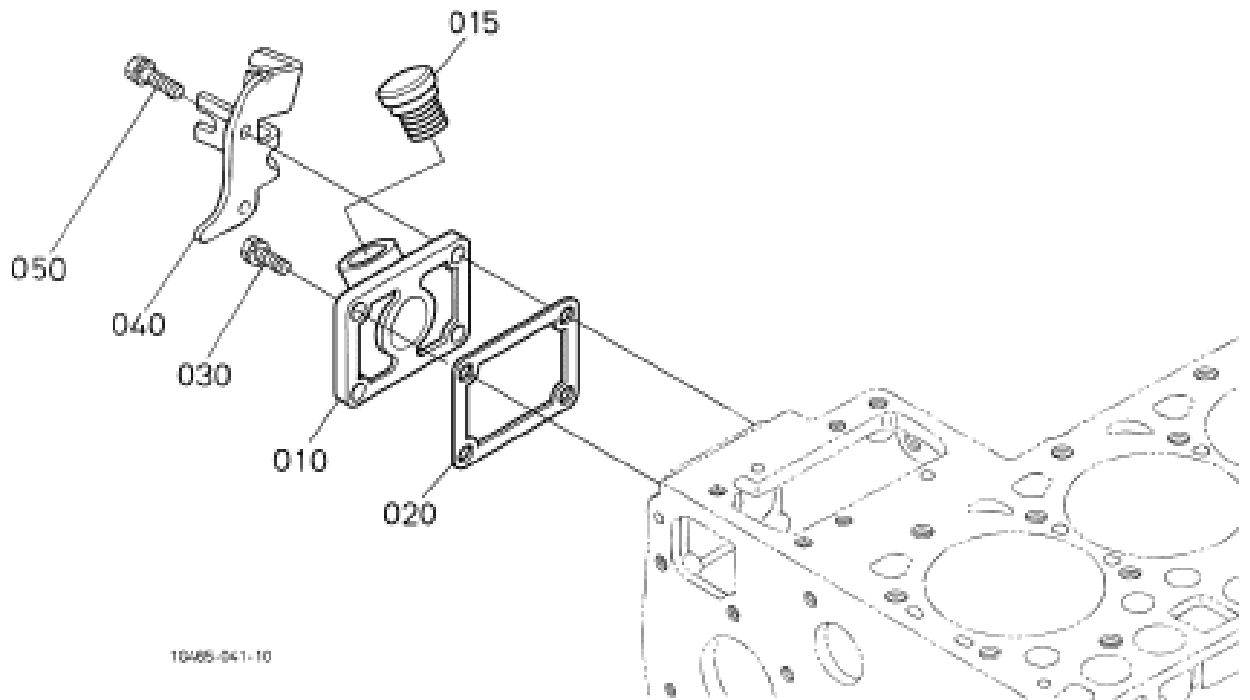
2203 KUBOTA ENGINE OIL PUMP



2203 KUBOTA ENGINE OIL PUMP			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338347	1	ASSY-OIL PUMP
020	3338348	1	GASKET-OIL PUMP
030	3338349	4	BOLT
040	3331576	1	GEAR, OIL PUMP DRIVE-210
050	3331577	1	KEY, FEATHER-220
060	3331578	1	NUT, FLANGE-230

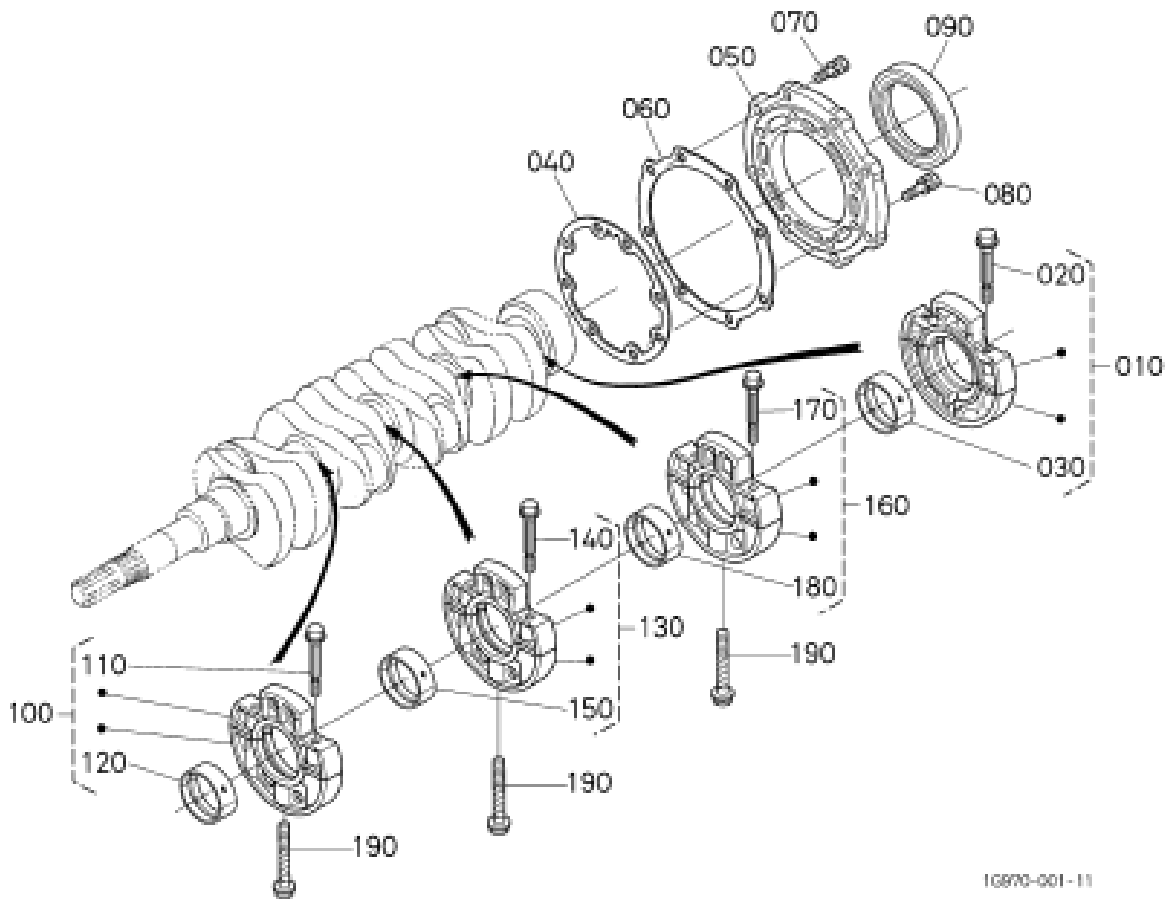
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE OIL FILLER FLANGE



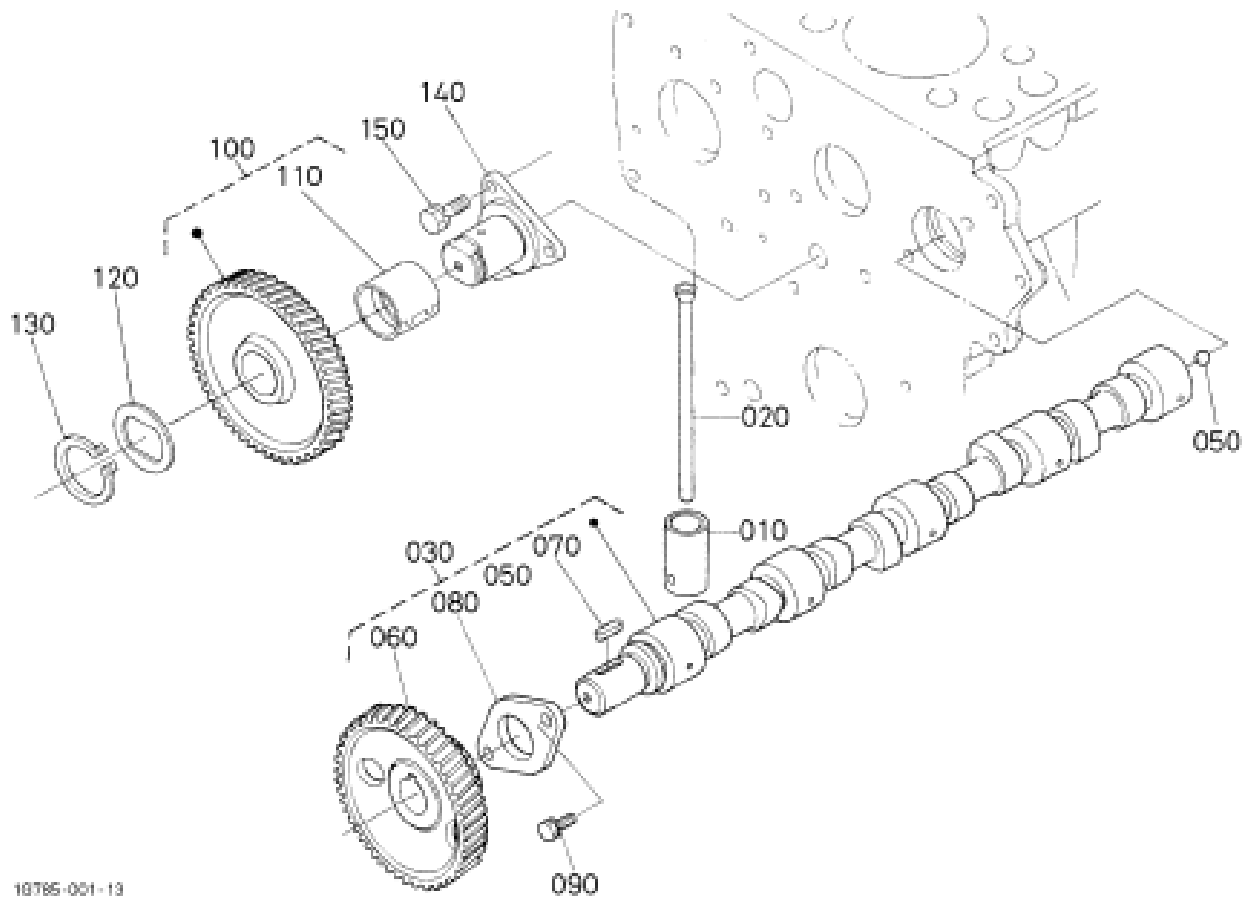
2203 KUBOTA ENGINE OIL FILLER FLANGE			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	--XXX--	-	NOT SOLD SEPARATELY
015	3338350	1	PLUG-OIL FILLER
020	3338351	1	GASKET-PUMP COVER
030	3331776	2	BOLT-150
040	3338352	1	BRACKET,ACCEL.CABLE
050	3338353	2	BOLT
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE MAIN BEARING CASE



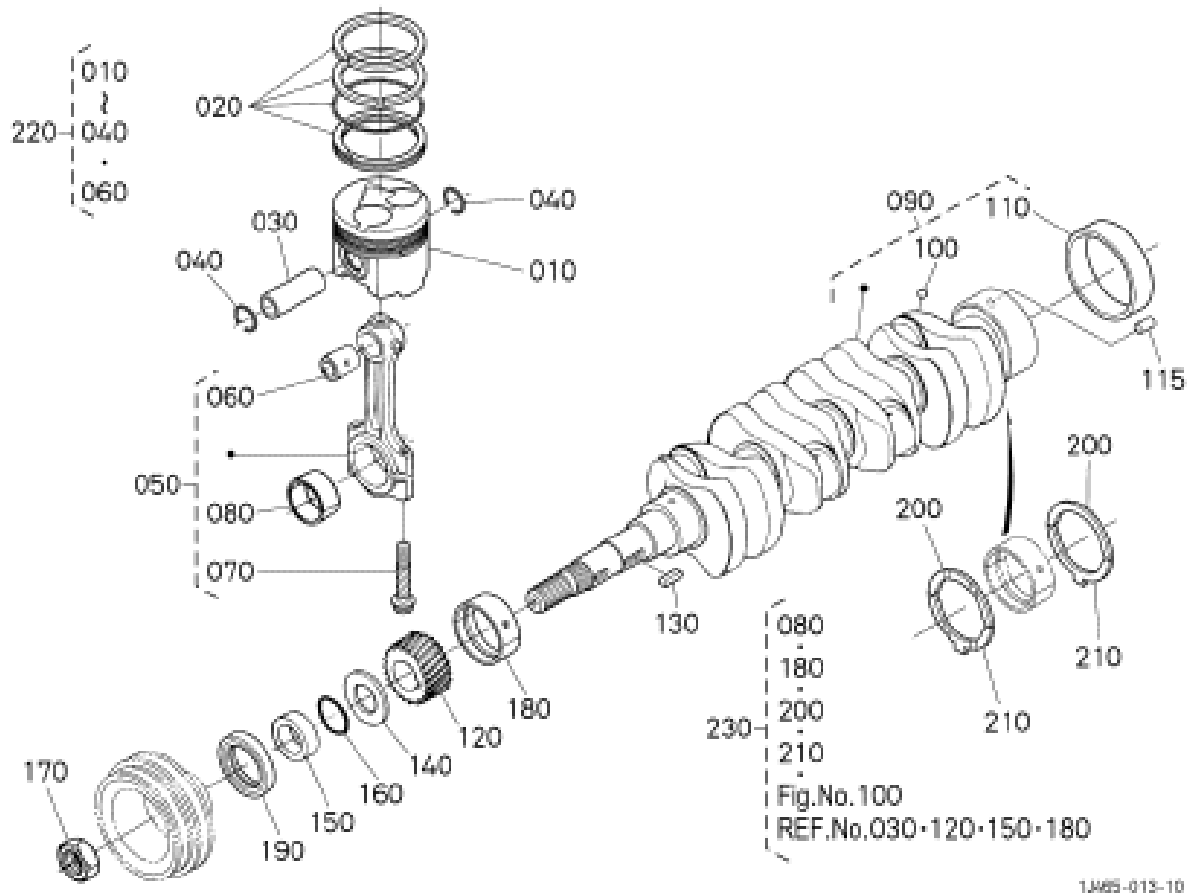
2203 KUBOTA ENGINE MAIN BEARING CASE			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338354	1	ASSY-BRG. CASE WHEEL
020	--XXX--	-	NOT SOLD SEPARATELY
030	--XXX--	-	NOT SOLD SEPARATELY
040	3338355	1	GASKET-BEARING CASE
050	3338356	1	COVER-BERING CASE
060	3338357	1	GASKET- CASE COVER
070	3331507	8	BOLT-060
080	3331508	8	BOLT-070
090	3338358	1	SEAL-OIL
100	3338359	1	ASSY-BRG. CASE MAIN
110	--XXX--	-	NOT SOLD SEPARATELY
120	--XXX--	-	NOT SOLD SEPARATELY
130	3338360	1	ASSY BRG.CASE,MAIN
140	--XXX--	-	NOT SOLD SEPARATELY
150	--XXX--	-	NOT SOLD SEPARATELY
160	3338361	1	ASSY BRG.CASE,MAIN
170	--XXX--	-	NOT SOLD SEPARATELY
180	--XXX--	-	NOT SOLD SEPARATELY
190	3331512	3	BOLT, BEARING CASE-110
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE CAMSHAFT AND IDLE GEAR SHAFT



2203 KUBOTA ENGINE CAMSHAFT AND IDLE GEAR SHAFT			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3331513	8	TAPPET-010
020	3331514	8	PUSH ROD -020
030	3338362	1	ASSY-CAMSHAFT
040	BLANK	-	NOT USED
050	3331692	1	BALL-100
060	--XXX--	-	NOT SOLD SEPARATELY
070	3331519	1	KEY, FEATHER-070
080	3331670	1	STOPPER, CAMSHAFT-080
090	3331671	2	BOLT-090
100	3338363	1	COMP. GEAR IDLE
110	--XXX--	-	NOT SOLD SEPARATELY
120	--XXX--	-	NOT SOLD SEPARATELY
130	--XXX--	-	NOT SOLD SEPARATELY
140	--XXX--	-	NOT SOLD SEPARATELY
150	3331671	3	BOLT-090
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

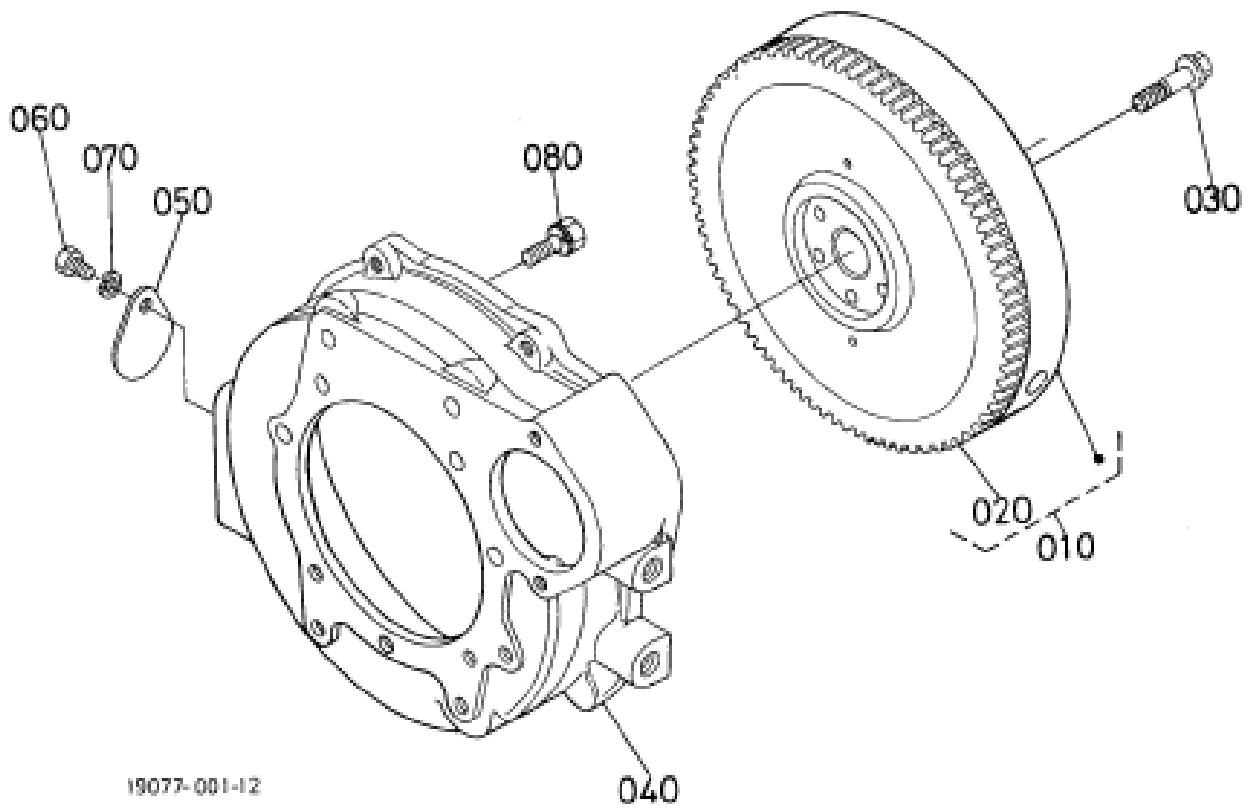
2203 KUBOTA ENGINE PISTON AND CRANKSHAFT



1JMB5-013-10

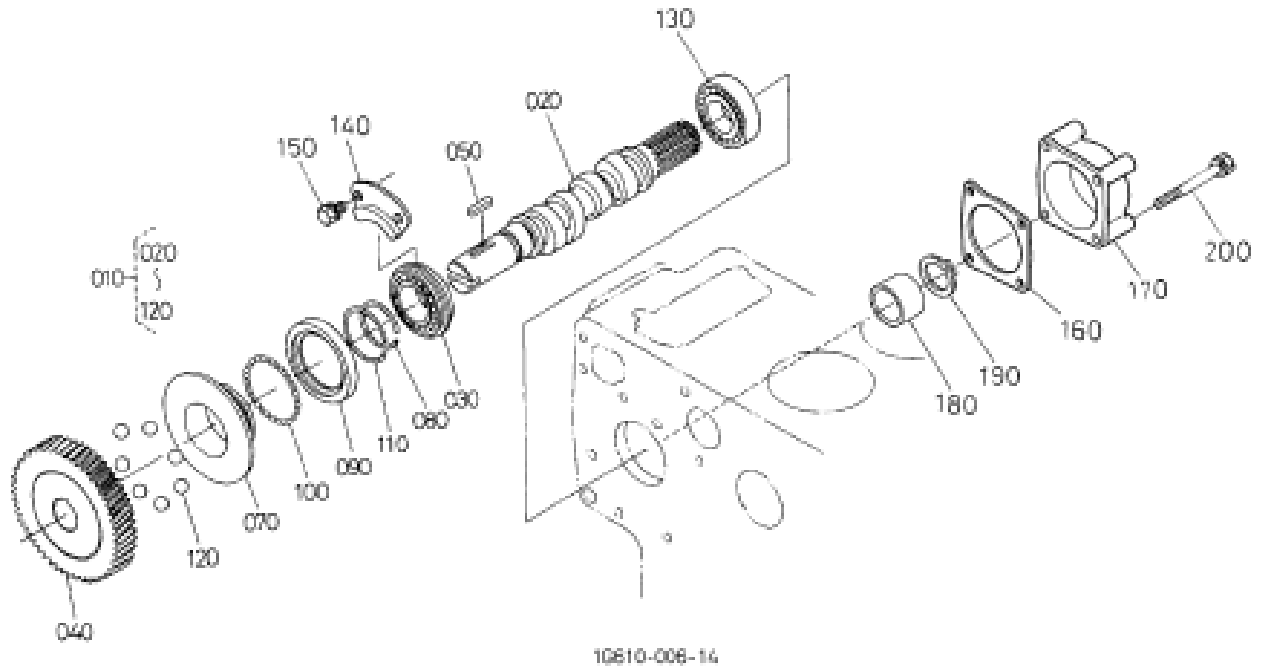
2203 KUBOTA ENGINE PISTON AND CRANKSHAFT			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	--XXX--	-	NOT SOLD SEPARATELY
020	3338364	4	ASSY-PISTON RING (STD.)
020	3338365	4	ASSY-PISTON RING (+0.25 MM)
030	--XXX--	-	NOT SOLD SEPARATELY
040	--XXX--	-	NOT SOLD SEPARATELY
050	3331685	4	ASSY CONNECTING ROD-050
060	3331686	4	BUSH, PISTON PIN-060
070	3331687	8	BOLT, CONNECTING ROD-070
080	3331688	4	METAL, CRANKPIN STD SET
090	3338366	1	COMP. CRANKSHAFT
100	3331692	4	BALL-100
110	3329732	1	0.2MM SLEEVE CRANKSHAFT
120	--XXX--	-	NOT SOLD SEPARATELY
130	--XXX--	-	NOT SOLD SEPARATELY
140	3331696	1	SLINGER, OIL-150
150	3331697	1	COLLAR, CRANKSHAFT-160
160	3331698	1	O RING - 170
170	--XXX--	-	NOT SOLD SEPARATELY
180	--XXX--	-	NOT SOLD SEPARATELY
190	3330290	1	SEAL OIL
200	--XXX--	-	NOT SOLD SEPARATELY
210	--XXX--	-	NOT SOLD SEPARATELY
220	3338367	4	KIT-PISTON (STD.)
220	3338368	4	KIT-PISTON (+0.25 MM)
230	3338369	1	KIT-METAL ENGINE (STD.)
230	3338370	1	KIT-METAL ENGINE (-0.20 MM/+0.20 MM)
230	3338371	1	KIT-METAL ENGINE (-0.40 MM/+0.40 MM)
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE FLYWHEEL



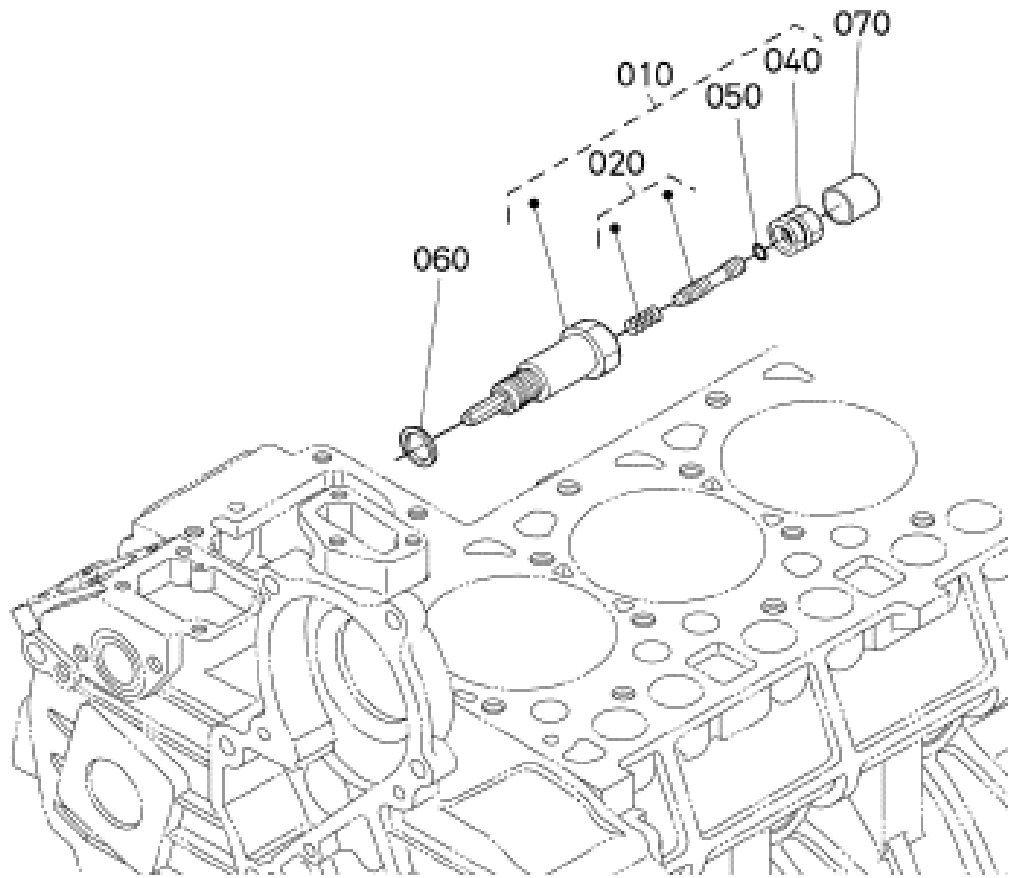
2203 KUBOTA ENGINE FLYWHEEL			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338372	1	COMP. FLYWHEEL
020	3331715	1	GEAR, RING-020
030	3331716	6	BOLT, FLYWHEEL-030
040	3331717	1	HOUSING, FLYWHEEL-040
050	3331718	1	COVER-050
060	3331719	1	BOLT-060
070	3331598	1	WASHER, SPRING-060
080	3331721	11	BOLT, F/HOUSING-080
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE FUEL CAMSHAFT AND GOVERNOR SHAFT



2203 KUBOTA ENGINE FUEL CAMSHAFT AND GOVERNOR SHAFT			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338373	1	ASSY-CAMSHAFT FUEL
020	--XXX--	-	NOT SOLD SEPARATELY
030	3331739	1	BEARING, BALL-030
040	3331740	1	GEAR, INJECTION PUMP-040
050	3331741	1	KEY, FEATHER-050
060	BLANK	-	NOT USED
070	3331743	1	SLEEVE, GOVERNOR
080	3331744	1	CIR-CLIP, GOV. SLEEVE-080
090	3331745	1	CASE, GOVERNOR BALL-090
100	3331746	39	BALL-100
110	3331747	1	CIR-CLIP-110
120	3331748	7	BALL-120
130	--XXX--	-	NOT SOLD SEPARATELY
140	3331750	1	STOPPER,FUEL.C/SHAFT-140
150	3331589	2	BOLT-070
160	3338374	1	GASKET
170	--XXX--	-	NOT SOLD SEPARATELY
180	--XXX--	-	NOT SOLD SEPARATELY
190	--XXX--	-	NOT SOLD SEPARATELY
200	3331757	4	BOLT-200
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

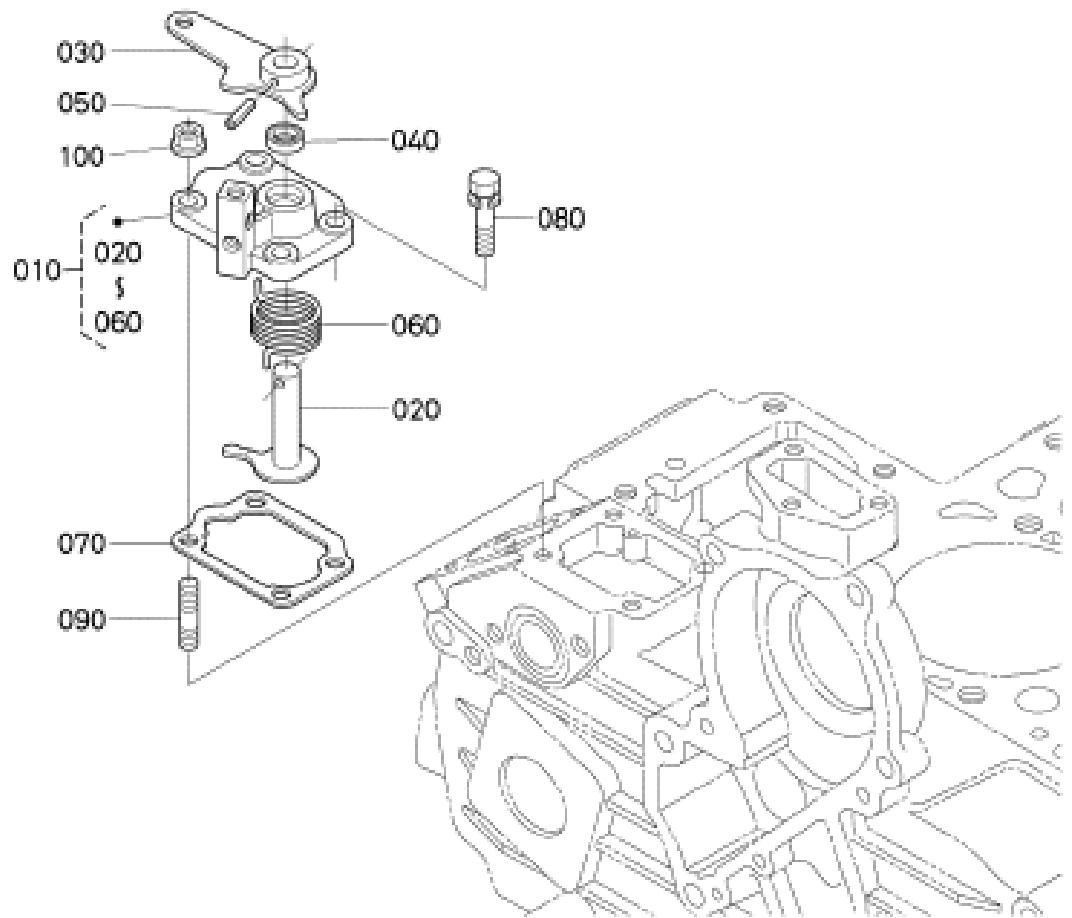
2203 KUBOTA ENGINE IDLE APPARATUS



1G176-005-11

2203 KUBOTA ENGINE IDLE APPARATUS			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338375	1	APPARATUS-IDLING
020	--XXX--	-	NOT SOLD SEPARATELY
030	BLANK	-	NOT USED
040	--XXX--	-	NOT SOLD SEPARATELY
050	--XXX--	-	NOT SOLD SEPARATELY
060	3338376	1	GASKET
070	--XXX--	-	NOT SOLD SEPARATELY
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

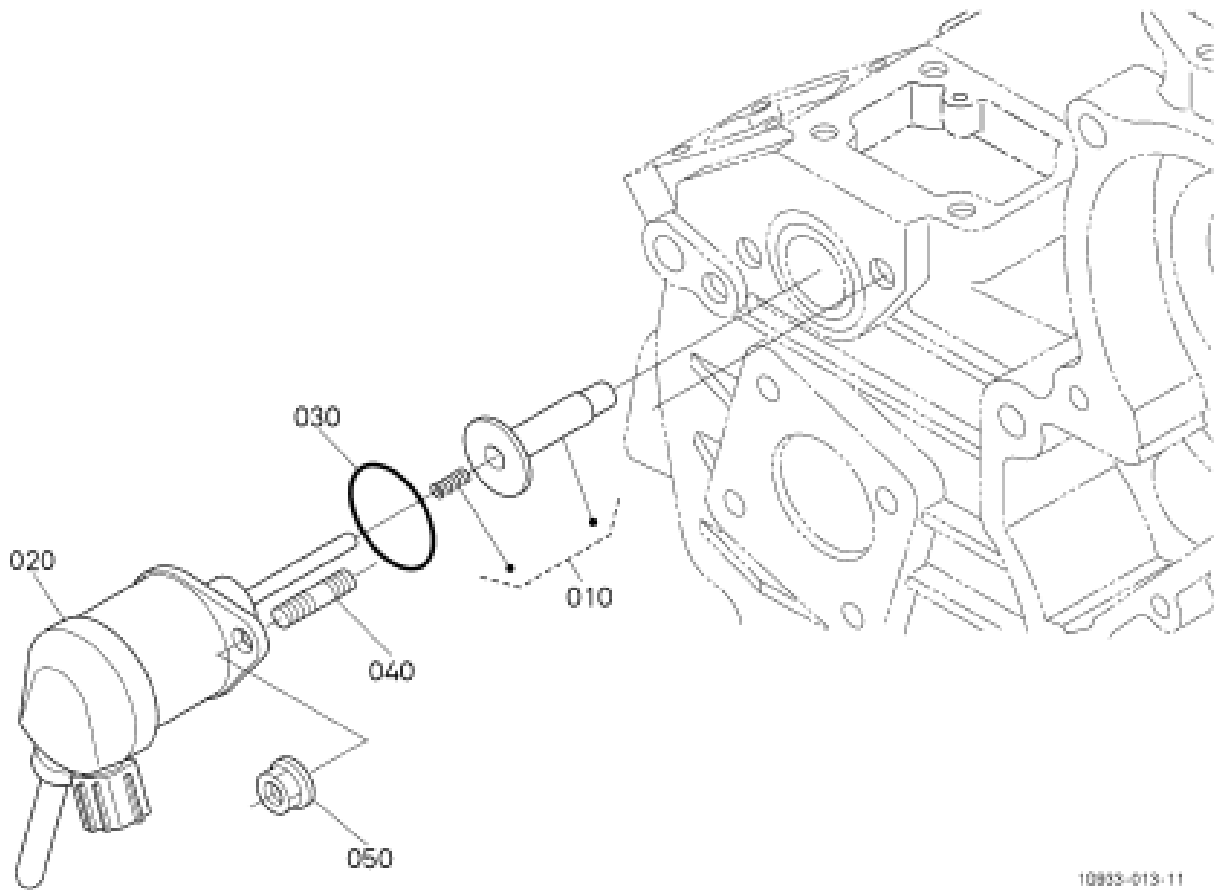
2203 KUBOTA ENGINE STOP LEVER



19345-095-10

2203 KUBOTA ENGINE STOP LEVER			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338377	1	ASSY-LEVER ENGINE STOP
020	--XXX--	-	NOT SOLD SEPARATELY
030	--XXX--	-	NOT SOLD SEPARATELY
040	3334298	1	SEAL-SPEED CONTROL PLATE ASSY KBA 2203 EMIS
050	3331772	1	PIN, SP
060	--XXX--	-	NOT SOLD SEPARATELY
070	3334297	1	GASKET-SPEED CONT PLT KBA2203 EMIS COMP
080	3331652	2	BOLT-240
090	3331624	2	STUD-360
100	--XXX--	-	NOT SOLD SEPARATELY
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE STOP SOLENOID

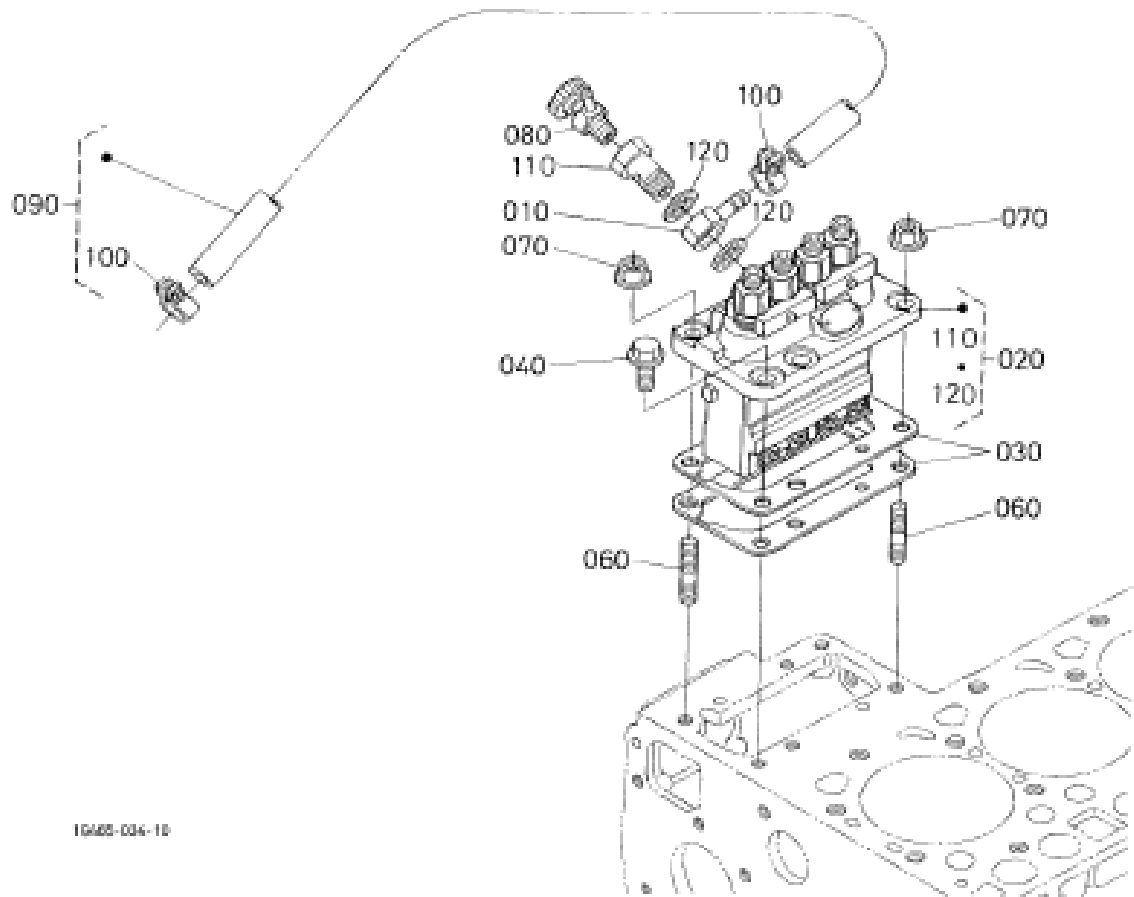


10803-013-11

2203 KUBOTA ENGINE STOP SOLENOID			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338378	1	COMP. GUIDE SOLENOID
020	3338379	1	ASSY-SOLENOID
030	3338380	1	O-RING
040	3331624	2	STUD-360
050	3338381	1	NUT-FLANGE

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

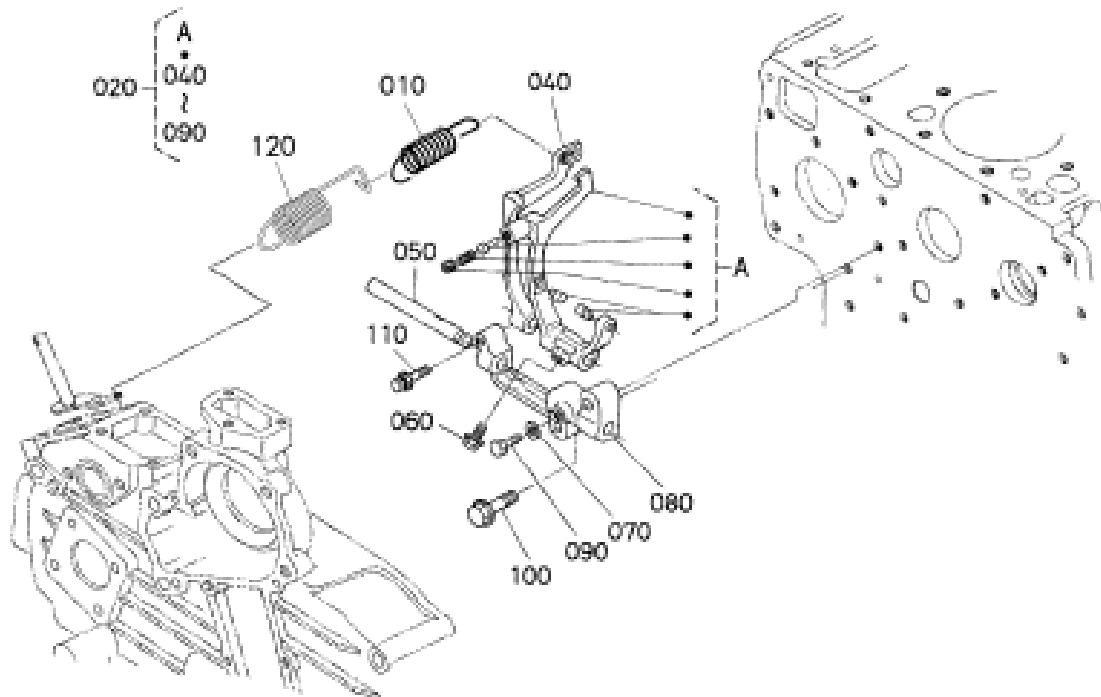
2203 KUBOTA ENGINE INJECTION PUMP



1G603-004-10

2203 KUBOTA ENGINE INJECTION PUMP			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	--XXX--	-	NOT SOLD SEPARATELY
020	3338382	1	ASSY-PUMP INJECTION
030	--XXX--	-	NOT SOLD SEPARATELY
040	3338383	4	BOLT-FLANGE
050	BLANK	-	NOT USED
060	3338384	2	STUD
070	3338385	2	NUT-FLANGE
080	3303591	1	ASSY-COCK JET START-KUBOTA(SP)
090	3331788	1	ASSY PIPE, FUEL-090
100	3331789	2	CLIP, PIPE-100
110	--XXX--	-	NOT SOLD SEPARATELY
120	--XXX--	-	NOT SOLD SEPARATELY
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

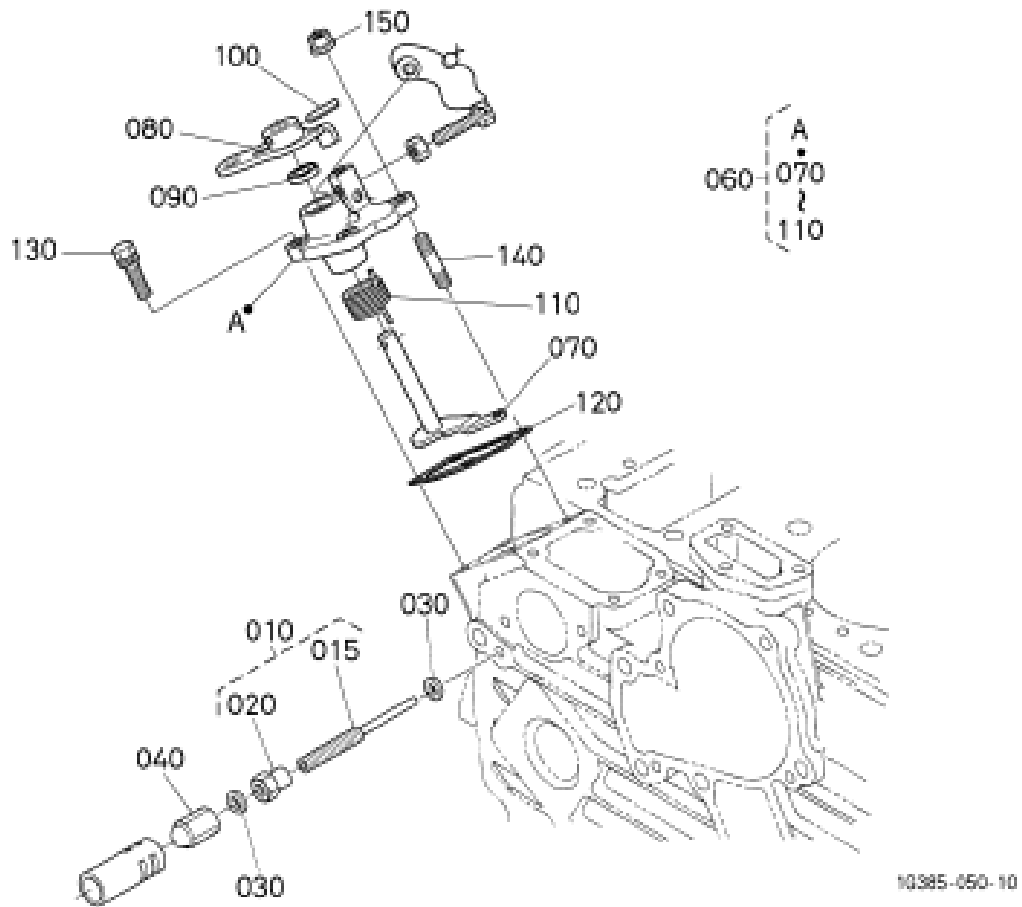
2203 KUBOTA ENGINE GOVERNOR



10475-008-14

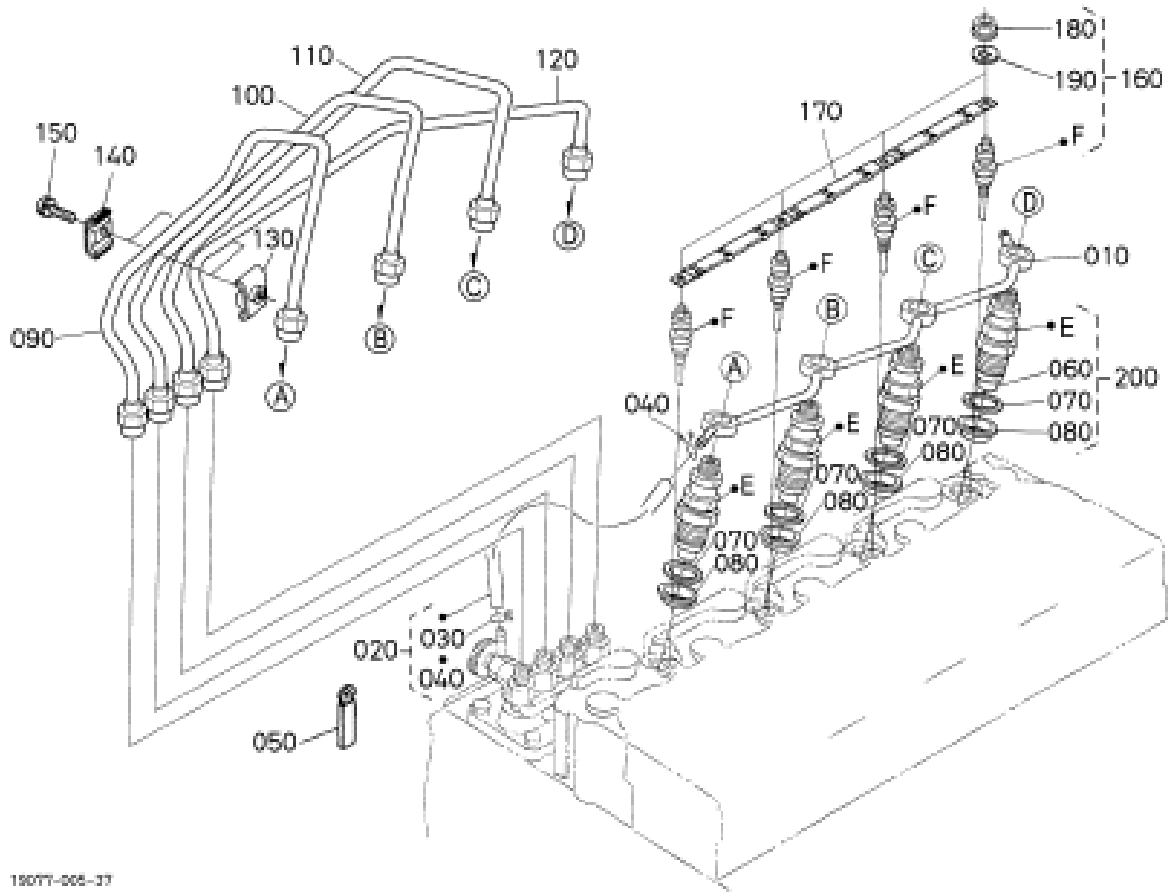
2203 KUBOTA ENGINE GOVERNOR			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3334295	1	SPRING-GOVENOR KBA 2203 EMIS COMP
020	3334293	1	ASSY-LEVER FORK KBA 2203 EMIS COMP
030	BLANK	-	NOT USED
040	--XXX--	-	NOT SOLD SEPARATELY
050	--XXX--	-	NOT SOLD SEPARATELY
060	--XXX--	-	NOT SOLD SEPARATELY
070	3331575	1	WASHER, SPRING -200
080	3331817	1	HOLDER, FORK LEVER- 070
090	3331818	1	BOLT -080
100	3338386	2	BOLT
110	3338387	1	SPRING-GOVERNOR
120	3334294	1	SPRING-GOVENOR KBA 2203 EMIS COMP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE SPEED CONTROL PLATE



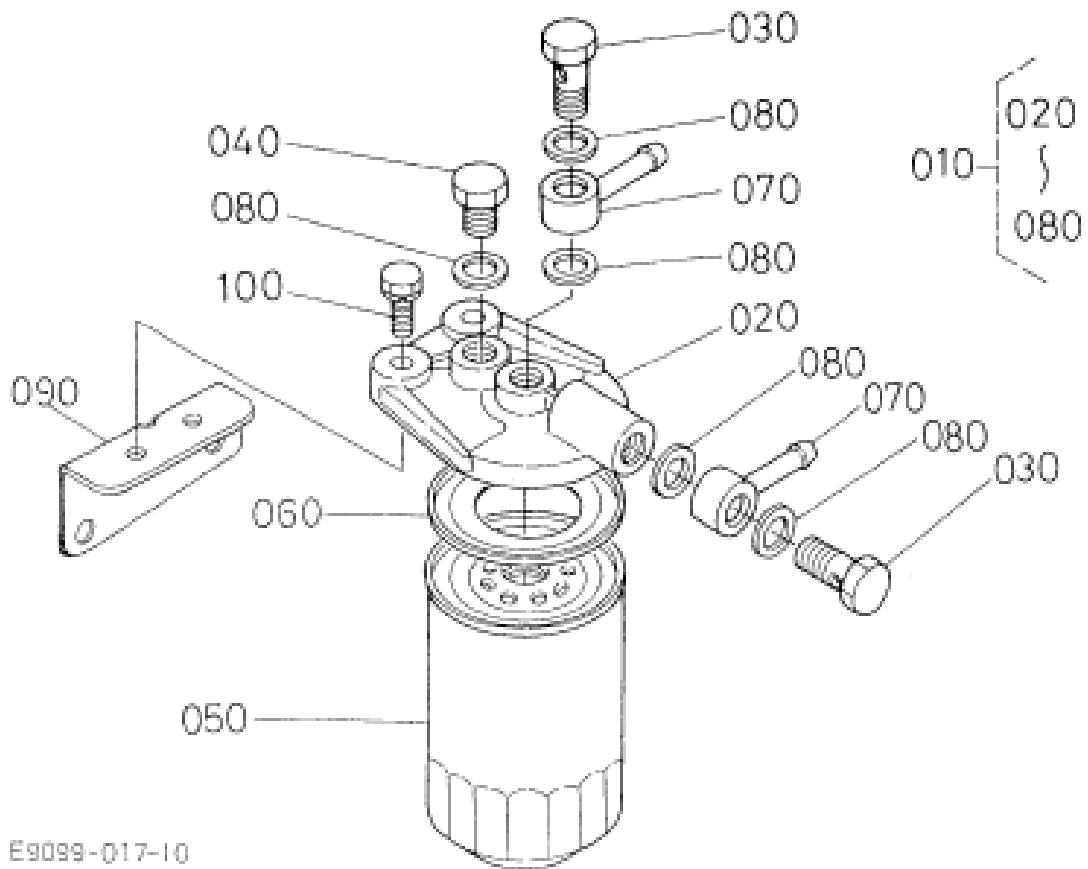
2203 KUBOTA ENGINE SPEED CONTROL PLATE			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338388	1	ASSY-BOLT ADJUSTMENT
015	--XXX--	-	NOT SOLD SEPARATELY
020	--XXX--	-	NOT SOLD SEPARATELY
030	3331828	2	GASKET- 030
040	3331829	1	NUT, CAP- 040
050	BLANK	-	NOT USED
060	3334296	1	ASSY-SPEED CONT PLATE KBA 2203 EMIS COMP
070	--XXX--	-	NOT SOLD SEPARATELY
080	--XXX--	-	NOT SOLD SEPARATELY
090	3334298	1	SEAL-SPEED CONT PLATE ASSY KBA 2203 EMIS
100	3331772	1	PIN, SPRING-120
110	--XXX--	-	NOT SOLD SEPARATELY
120	3334297	1	GASKET-SPEED CONT PLT KBA2203 EMIS COMP
130	3331652	2	BOLT-240
140	3331624	2	STUD-360
150	3338389	2	NUT-FLANGE
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE NOZZLE HOLDER AND GLOW PLUG



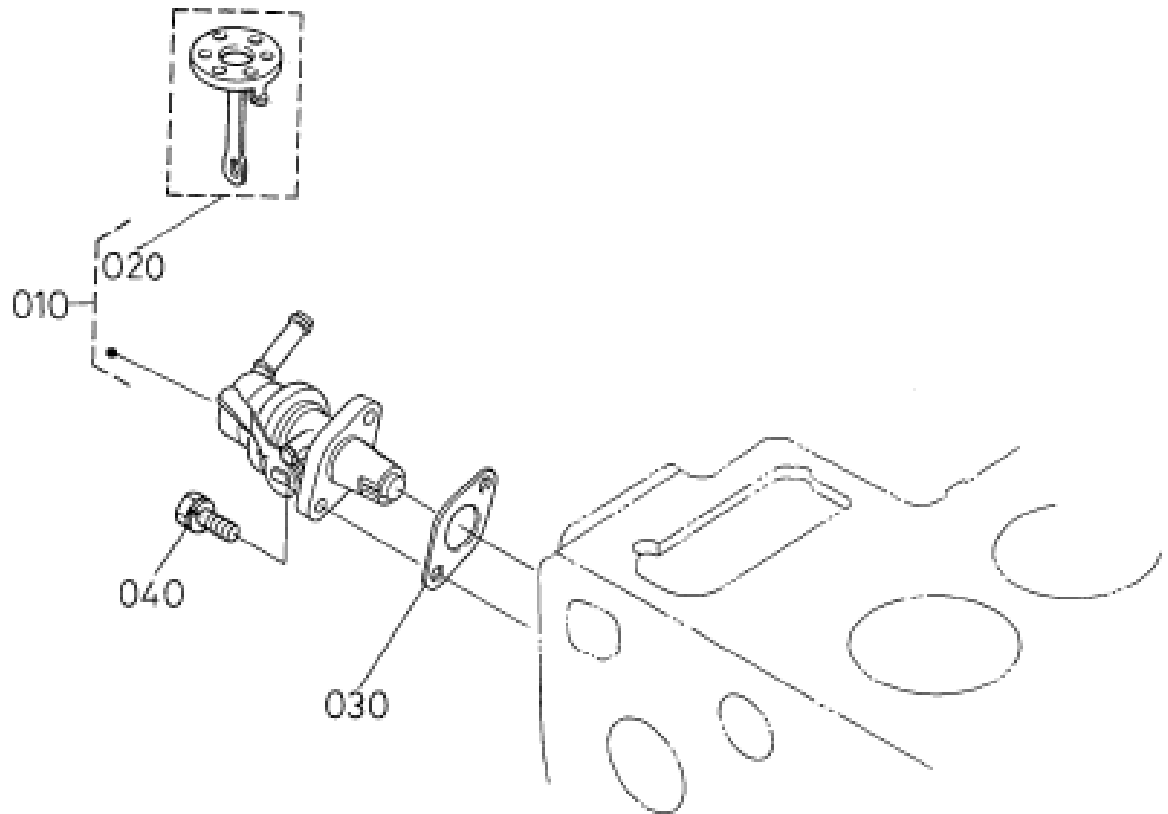
2203 KUBOTA ENGINE NOZZLE HOLDER AND GLOW PLUG			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338390	1	ASSY-PIPE OVERFLOW
020	3331846	1	ASSY, PIPE OVER FLOW -020
030	3331847	1	CLIP PIPE-030
040	--XXX--	-	NOT SOLD SEPARATELY
050	3331868	1	CLAMP, CORD- 160
060	--XXX--	-	NOT SOLD SEPARATELY
070	3332432	4	KUBOTA GASKET
080	3331853	4	SEAL, HEAT -070
090	3331856	1	PIPE INJECTION 15056~
100	3331859	1	PIPE INJECTION 15056~
110	3331862	1	PIPE INJECTION 15056~
120	3338391	1	PIPE-INJECTION
130	3331861	3	PIPE INJECTION 14840~
140	3331864	3	CLAMP, PIPE -120
150	3331865	3	SCREW W/WASHER -130
160	3331866	4	PLUG GLOW -140
170	3338392	1	CORD-GLOW PLUG
180	--XXX--	-	NOT SOLD SEPARATELY
190	--XXX--	-	NOT SOLD SEPARATELY
200	3338393	4	KIT-HOLDER NOZZLE
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE FUEL FILTER



2203 KUBOTA ENGINE FUEL FILTER			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338394	1	ASSY-FILTER FUEL
020	--XXX--	-	NOT SOLD SEPARATELY
030	--XXX--	-	NOT SOLD SEPARATELY
040	--XXX--	-	NOT SOLD SEPARATELY
050	3338395	1	FUEL FILTER
060	3338396	1	GASKET
070	--XXX--	-	NOT SOLD SEPARATELY
080	--XXX--	-	NOT SOLD SEPARATELY
090	--XXX--	-	NOT SOLD SEPARATELY
100	3338397	2	BOLT
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE FUEL PUMP (MECHANICAL)

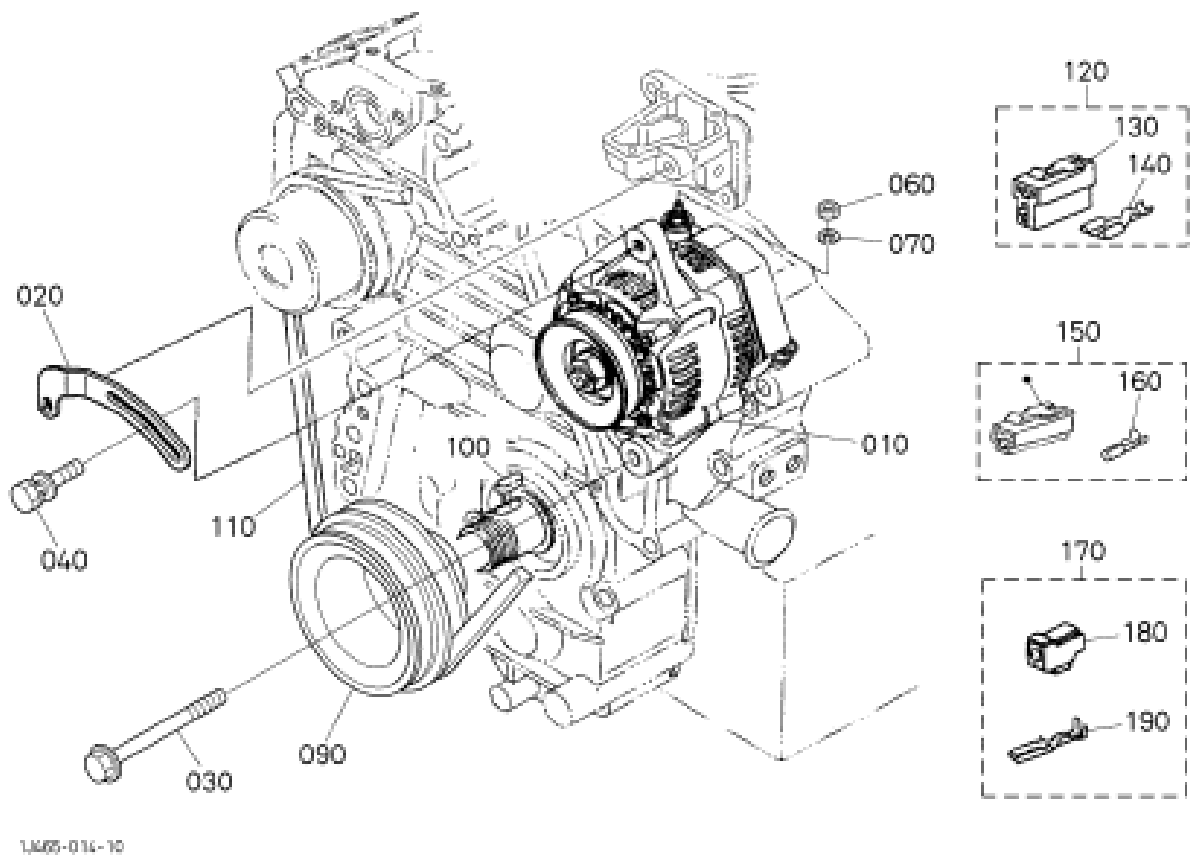


1E064-004-10

2203 KUBOTA ENGINE FUEL PUMP (MECHANICAL)			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3331924	1	ASSY PUMP FUEL -010
020	3338398	1	COMP. DIAPHRAGM
030	3338399	1	GASKET-FUEL PUMP
040	3331926	2	BOLT- 030

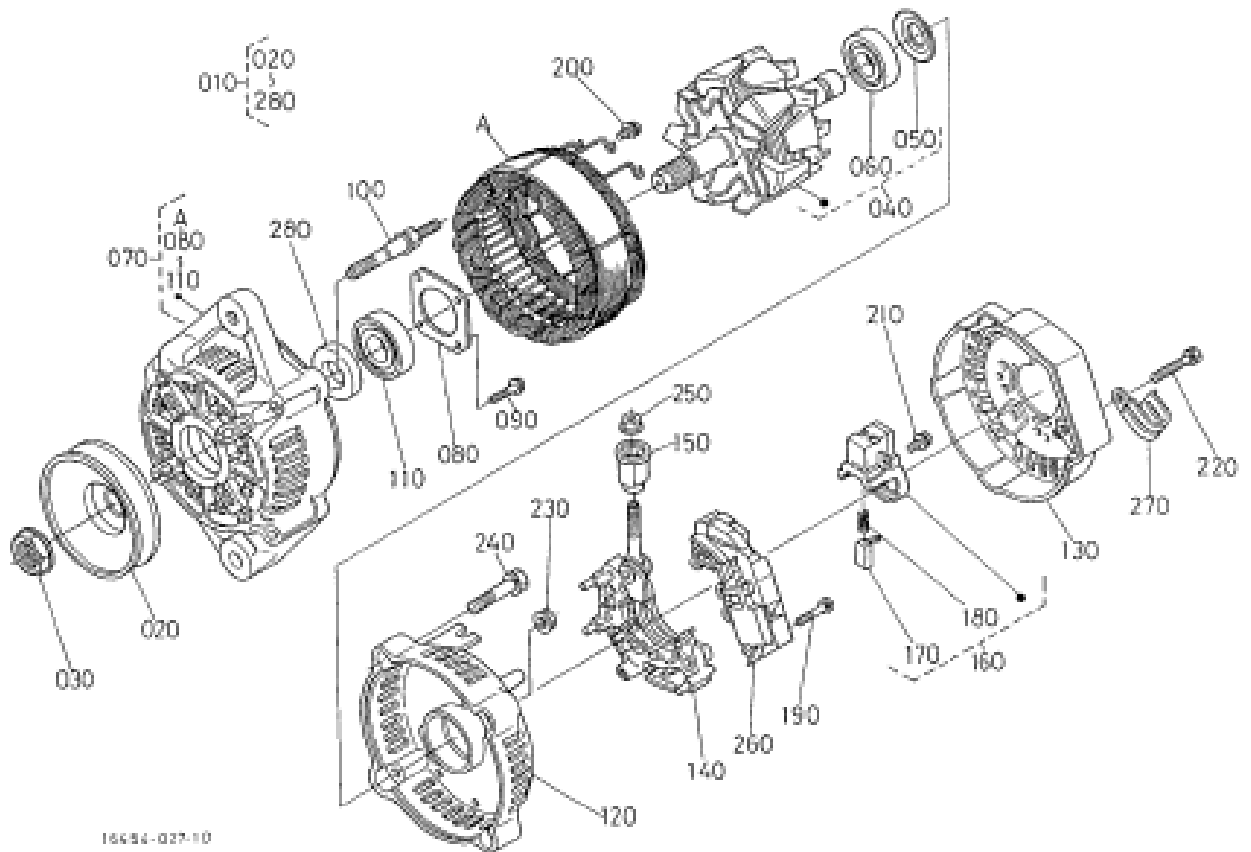
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE ALTERNATOR AND PULLEY



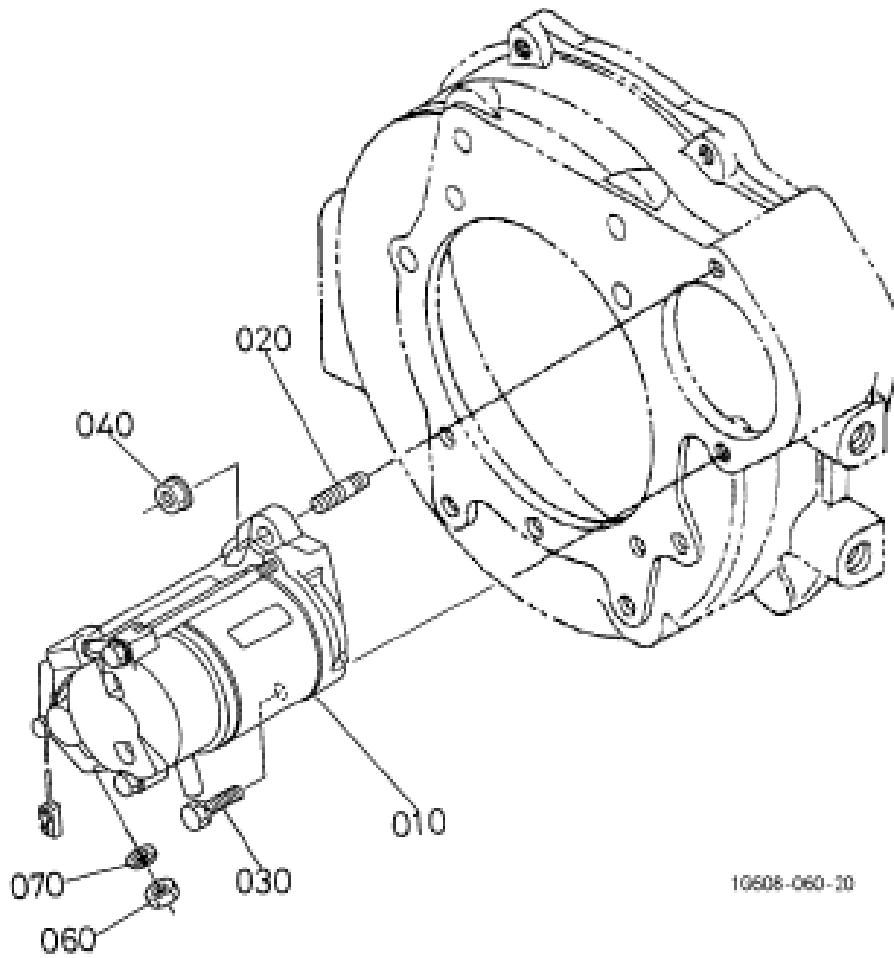
2203 KUBOTA ENGINE ALTERNATOR AND PULLEY			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338400	1	ASSY-ALTERNATOR
020	--XXX--	-	NOT SOLD SEPARATELY
030	3338401	1	BOLT-FLANGE
040	3338402	1	BOLT
050	BLANK	-	NOT USED
060	3331620	1	NUT-330
070	3331575	1	WASHER, SPRING -200
080	BLANK	-	NOT USED
090	--XXX--	-	NOT SOLD SEPARATELY
100	3331519	1	KEY, FEATHER-070
110	3338956	1	BELT, COG
120	3306810	1	TERMINAL-2 PRG KBA ALT 71G(SP)
130	3331946	1	CONNECT -160
140	3331947	2	TERMINAL -170
150	3331953	1	ASSY COUPLER- 230
160	3331954	1	TERMINAL -240
170	--XXX--	-	NOT SOLD SEPARATELY
180	--XXX--	-	NOT SOLD SEPARATELY
190	--XXX--	-	NOT SOLD SEPARATELY
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE ALTERNATOR (COMPONENT PARTS)



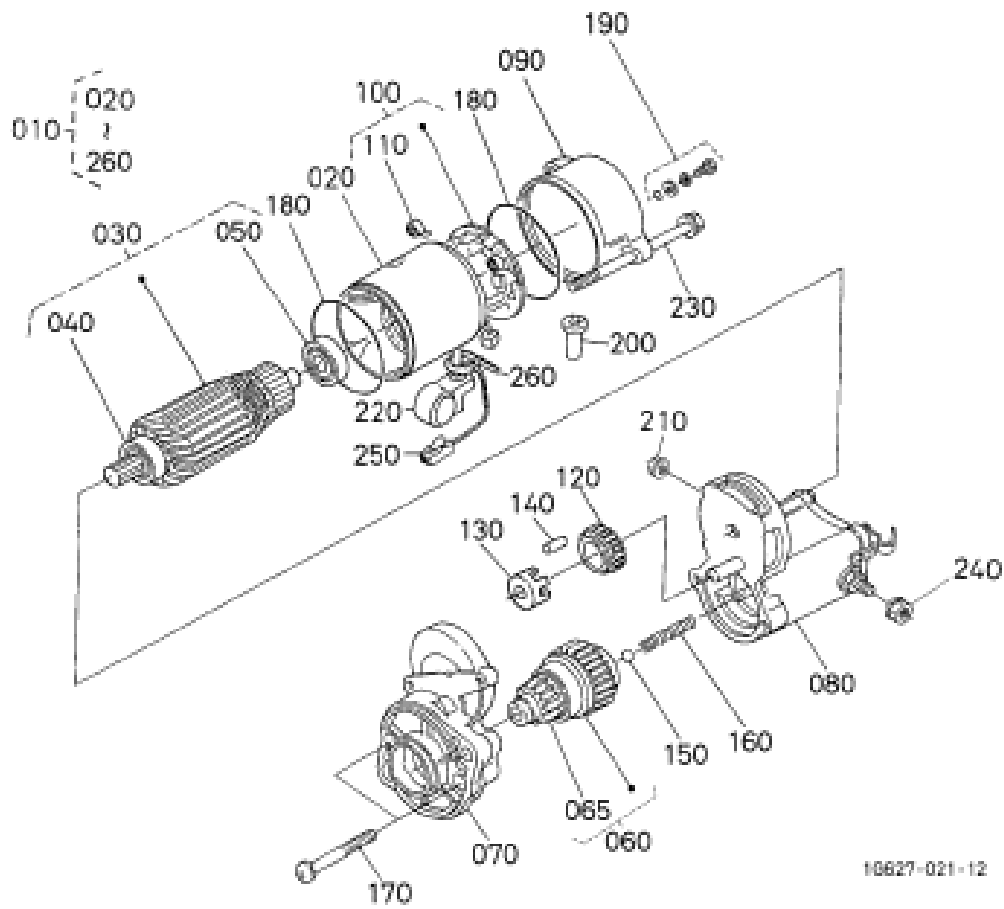
2203 KUBOTA ENGINE ALTERNATOR (COMPONENT PARTS)			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338400	1	ASSY-ALTERNATOR
020	3331956	1	PULLEY ALTERNATOR- 020
030	3331957	1	NUT- 030
040	--XXX--	-	NOT SOLD SEPARATELY
050	3331960	1	COVER BEARING- 060
060	--XXX--	-	NOT SOLD SEPARATELY
070	--XXX--	-	NOT SOLD SEPARATELY
080	3331964	1	PLATE, RETAINER -100
090	3331965	4	SCREW, ROUND HEAD -110
100	3331966	2	BOLT, THROUGH -120
110	3331967	1	BEARING BALL -130
120	--XXX--	-	NOT SOLD SEPARATELY
130	--XXX--	-	NOT SOLD SEPARATELY
140	--XXX--	-	NOT SOLD SEPARATELY
150	--XXX--	-	NOT SOLD SEPARATELY
160	3331972	1	HOLDER BRUSH -180
170	3331973	2	BRUSH -190
180	3331974	2	SPRING BRUSH- 200
190	3331975	2	SCREW, ROUND HEAD -210
200	3331976	6	SCREW ROUND HEAD- 220
210	3331977	1	SCREW ROUND HEAD- 230
220	3331978	3	BOLT- 240
230	3331979	2	NUT- 250
240	3331980	2	BOLT- 260
250	3331981	1	NUT- 270
260	--XXX--	-	NOT SOLD SEPARATELY
270	--XXX--	-	NOT SOLD SEPARATELY
280	3331958	1	COLLAR -040
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE STARTER



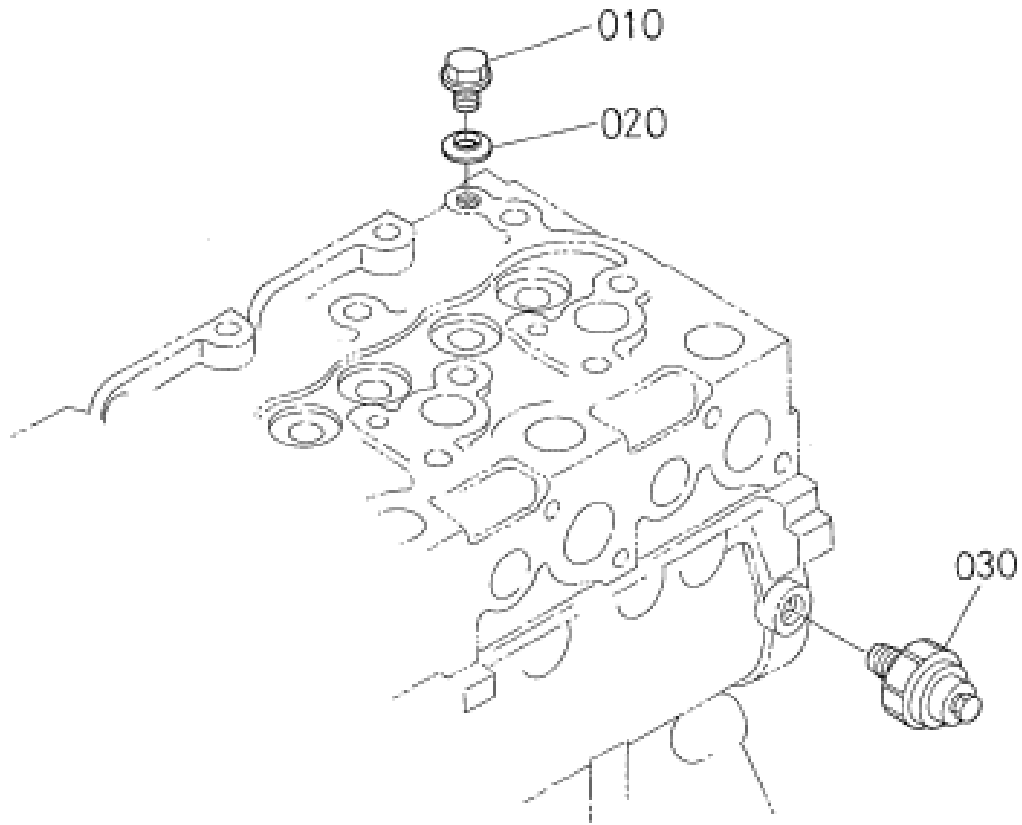
2203 KUBOTA ENGINE STARTER			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3331984	1	STARTER-KUBOTA 1402/03 1902/03 2203
020	3331985	1	STUD- 020
030	3331986	1	BOLT -030
040	3338403	1	NUT-FLANGE
050	BLANK	-	NOT USED
060	3331989	1	NUT- 060
070	3331598	1	WASHER, SPRING-060
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE STARTER (COMPONENT PARTS)



2203 KUBOTA ENGINE STARTER (COMPONENT PARTS)			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3331984	1	STARTER-KUBOTA 1402/03 1902/03 2203
020	--XXX--	-	NOT SOLD SEPARATELY
030	3331995	1	ASSY ARMATURE -030
040	3331996	1	BEARING- 040
050	3331997	1	BEARING- 050
060	3331998	1	CLUTCH, OVER RUNNING- 060
065	--XXX--	-	NOT SOLD SEPARATELY
070	3331999	1	FRAME, DRIVE END- 070
080	--XXX--	-	NOT SOLD SEPARATELY
090	3332002	1	FRAME- 090
100	3332003	1	ASSY HOLDER, BRUSH- 100
110	3332004	4	SPRING BRUSH- 110
120	3332005	1	GEAR- 120
130	3332006	1	RETAINER- 130
140	3332007	5	ROLLER- 140
150	3332009	1	BALL- 160
160	3332008	1	SPRING- 150
170	3332010	2	BOLT- 170
180	3332017	2	O RING -180
190	3332018	2	ASSY BOLT- 190
200	3332019	1	PIPE, DRAIN- 200
210	--XXX--	-	NOT SOLD SEPARATELY
220	--XXX--	-	NOT SOLD SEPARATELY
230	3332021	2	BOLT- 220
240	3332022	1	NUT, HEXAGON- 230
250	3331992	1	CORD, STOP SOLENOID 12830~
260	--XXX--	-	NOT SOLD SEPARATELY
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE OIL SWITCH AND PLUG



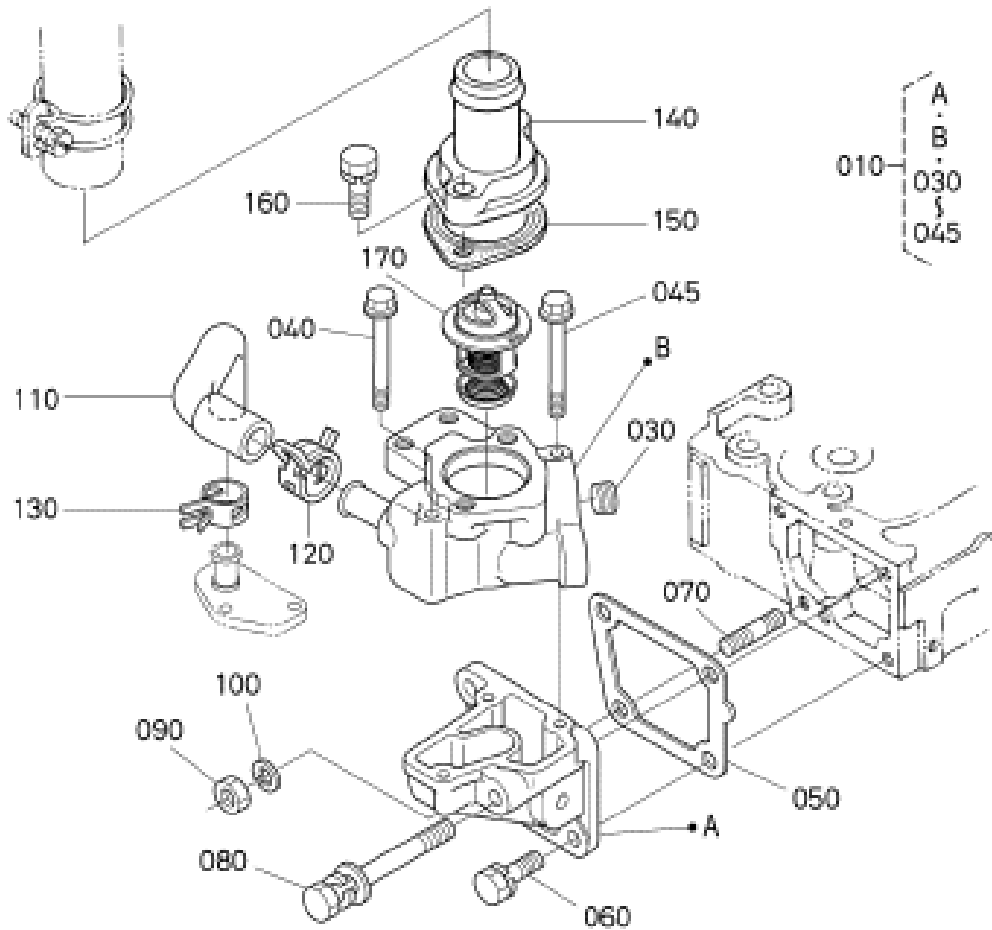
17290-018-10

2203 KUBOTA ENGINE OIL SWITCH AND PLUG

ITEM	PART NO.	REQ'D	DESCRIPTION
010	3332023	1	PLUG- 010
020	3332024	1	WASHER,W/RUBB- 020
030	748403	1	SWITCH, OIL

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

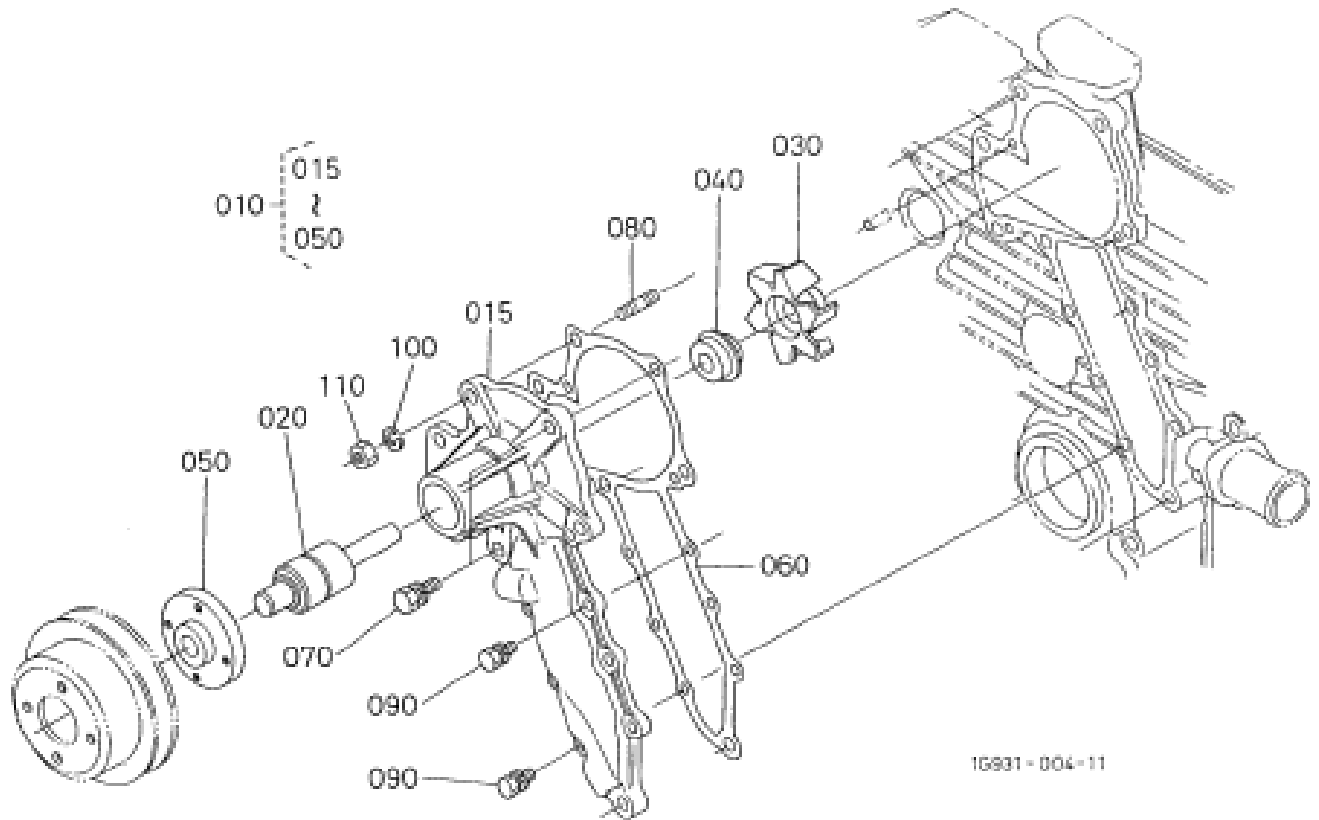
2203 KUBOTA ENGINE WATER FLANGE AND THERMOSTAT



1G933-019-15

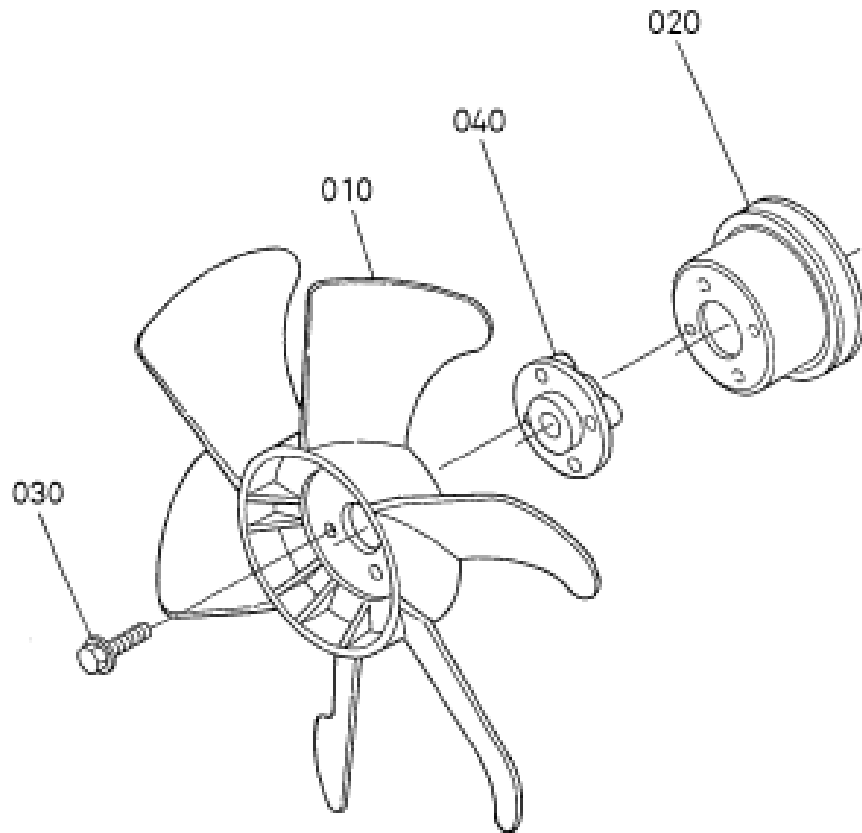
2203 KUBOTA ENGINE WATER FLANGE AND THERMOSTAT			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338404	1	COMP. FLANGE WATER
020	BLANK	-	NOT USED
030	--XXX--	-	NOT SOLD SEPARATELY
040	--XXX--	-	NOT SOLD SEPARATELY
045	--XXX--	-	NOT SOLD SEPARATELY
050	3338405	1	GASKET-WATER FLANGE
060	3338406	2	BOLT
070	3331784	1	STUD-050
080	3338407	1	BOLT
090	3331597	1	NUT-050
100	3331598	1	WASHER, SPRING-060
110	3334302	1	PIPE-WATER RET STAT KBA 2203 EMIS COMP
120	3338408	1	CLAMP-HOSE
130	3334303	1	CLAMP-WATER RETURN PIPE T STAT KBA 2203
140	3332039	1	COVER, THERMOSTAT- 130
150	3336918	1	GASKET - THERMOSTAT KUBOTA
160	3338409	2	BOLT
170	3334304	1	THERMOSTAT-KBA 2203 EMIS COMP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE WATER PUMP



2203 KUBOTA ENGINE WATER PUMP			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3334305	1	PUMP-WATER KBA 2203 EMIS COMP
015	--XXX--	-	NOT SOLD SEPARATELY
020	3332046	1	BEARING- 020
030	--XXX--	-	NOT SOLD SEPARATELY
040	3332048	1	ASSY- SEAL, MECHANICAL-040
050	--XXX--	-	NOT SOLD SEPARATELY
060	3339010	1	GASKET, WATER PUMP
070	3331508	2	BOLT-070
080	3338410	1	STUD
090	3331776	6	BOLT-150
100	3331598	1	WASHER, SPRING-060
110	3331597	1	NUT-050
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE FAN

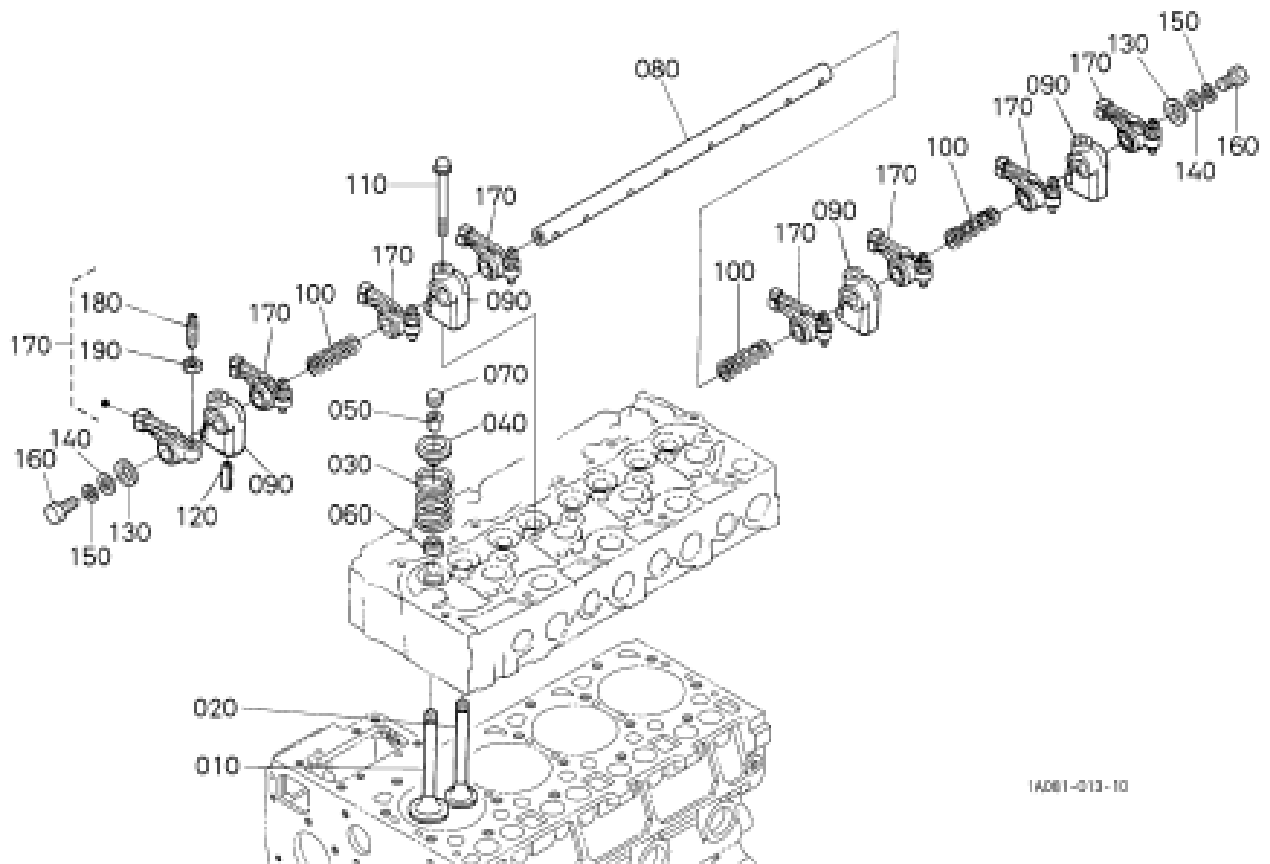


1G465-043-10

2203 KUBOTA ENGINE FAN			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3350449	1	FAN-ENGINE 6-BLADE V2203 KBA
020	--XXX--	-	NOT SOLD SEPARATELY
030	3338411	4	BOLT-FLANGE
040	--XXX--	-	NOT SOLD SEPARATELY

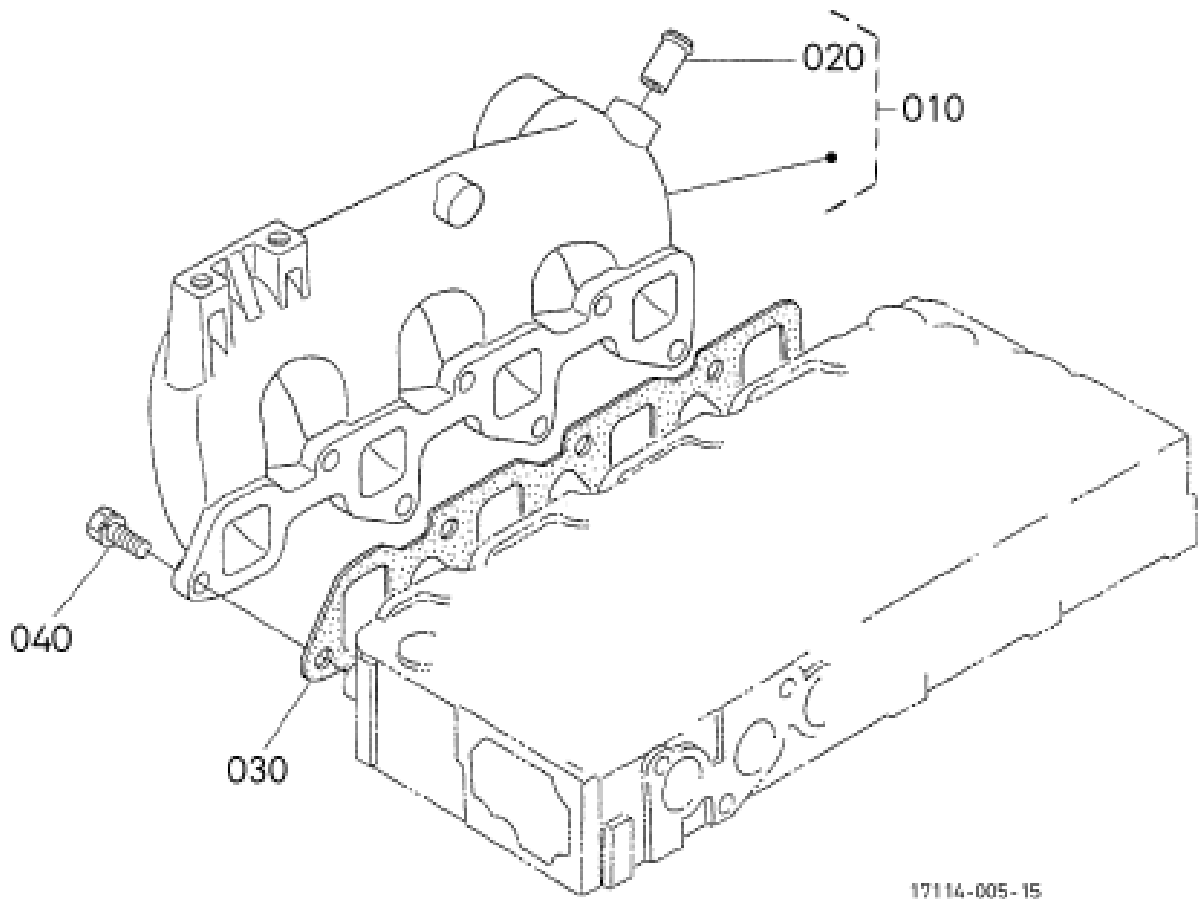
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE VALVE AND ROCKER ARM



2203 KUBOTA ENGINE VALVE AND ROCKER ARM			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338412	4	VALVE-INLET
020	3338413	4	VALVE-EXHAUST
030	3332090	8	SPRING, VALVE- 030
040	3332091	8	RETAINER, VALVE SP- 040
050	3338414	8	COLLET-VALVE SPRING (SET)
060	3338415	8	SEAL-VALVE STEM
070	3332094	8	CAP, VALVE- 070
080	3338416	1	SHAFT-ROCKER ARM
090	3338417	4	BRACKET-ROCKER ARM
100	3332105	3	SPRING, ROCKER ARM- 170
110	3338418	4	BOLT-FLANGE
120	3332103	1	PIN, SPRING- 12660~
130	3332104	2	WASHER, R-ARM. SHAFT- 160
140	3338419	2	WASHER-PLAIN
150	3331598	2	WASHER, SPRING-060
160	3331719	2	BOLT-060
170	3332107	8	ASSY ROCKER ARM- 190
180	3332108	8	SCREW,ADJUSTING- 200
190	3332109	8	NUT- 210
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE INLET MANIFOLD

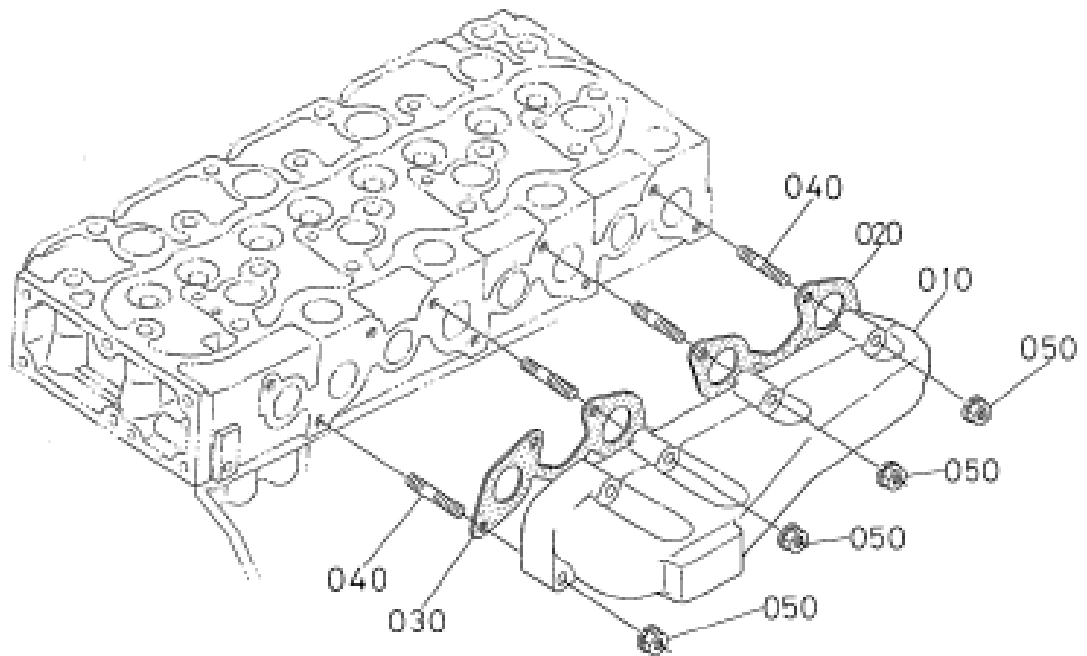


17114-005-15

2203 KUBOTA ENGINE INLET MANIFOLD			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338420	1	COMP. MANIFOLD INLET
020	--XXX--	-	NOT SOLD SEPARATELY
030	3338421	1	GASKET-IN-MANIFOLD
040	3331783	7	BOLT-040

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE EXHAUST MANIFOLD

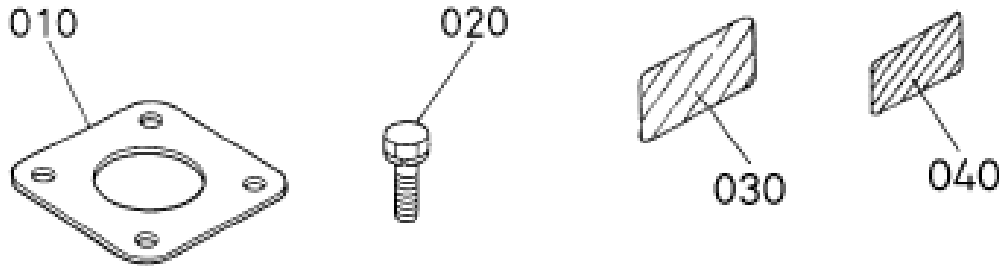


16434-069-10

2203 KUBOTA ENGINE EXHAUST MANIFOLD			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338422	1	MANIFOLD-EXHAUST
020	3338423	1	GASKET-EXHAUST MANIFOLD
030	3338424	1	GASKET-EXHAUST MANIFOLD
040	3338425	8	STUD
050	3338426	8	NUT

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE ACCESSORIES AND SERVICE PARTS

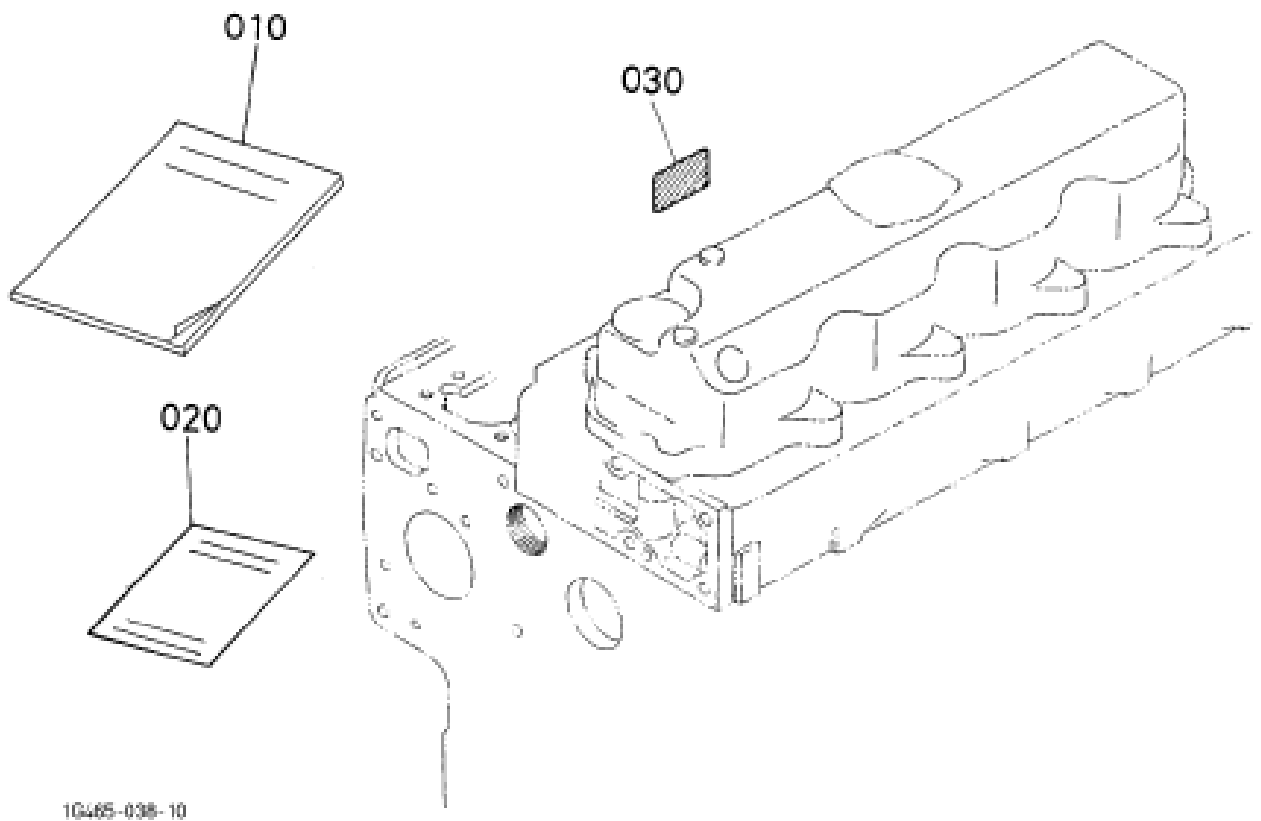


10465-037-10

2203 KUBOTA ENGINE ACCESSORIES AND SERVICE PARTS			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3332122	1	GASKET, MUFFLER
020	3331507	4	BOLT-060
030	3332064	1	LABEL INSTRUCTION- 080
040	--XXX--	-	NOT SOLD SEPARATELY

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

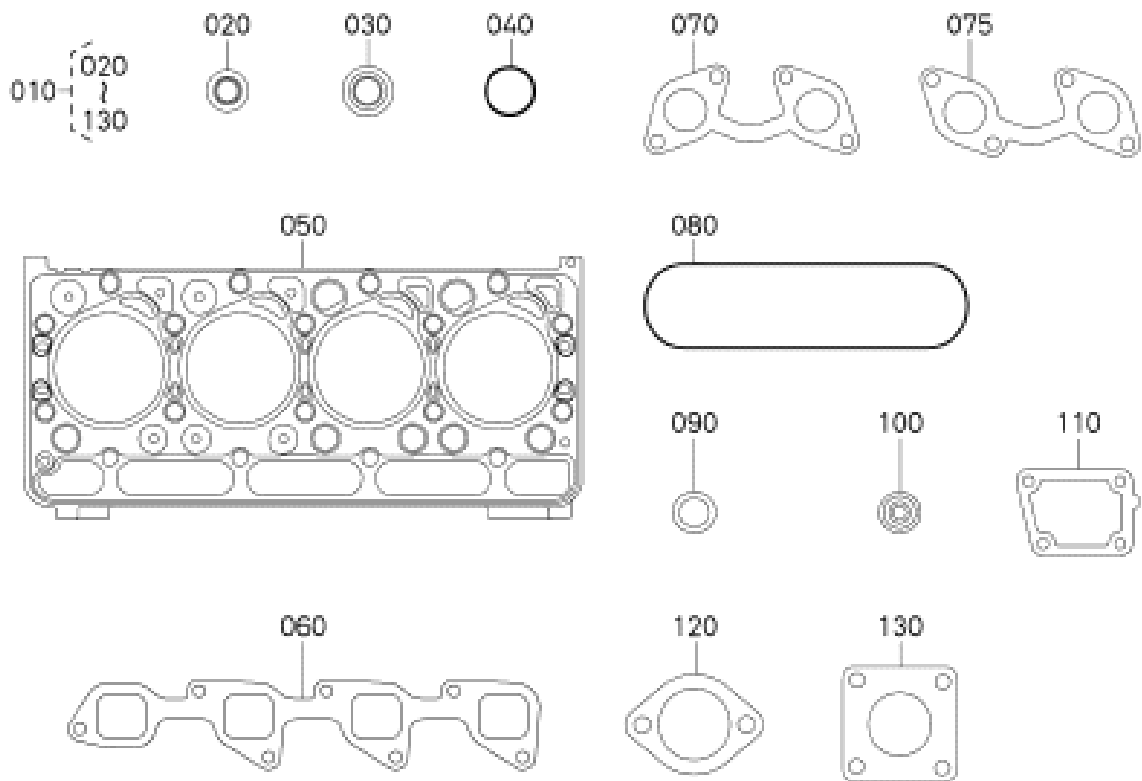
2203 KUBOTA ENGINE LABEL AND OPERATOR'S MANUAL



2203 KUBOTA ENGINE LABEL AND OPERATOR'S MANUAL			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338427	1	OPERATORS MANUAL
020	3338428	1	STATEMENT-WARRANTY
030	--XXX--	-	NOT SOLD SEPARATELY

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

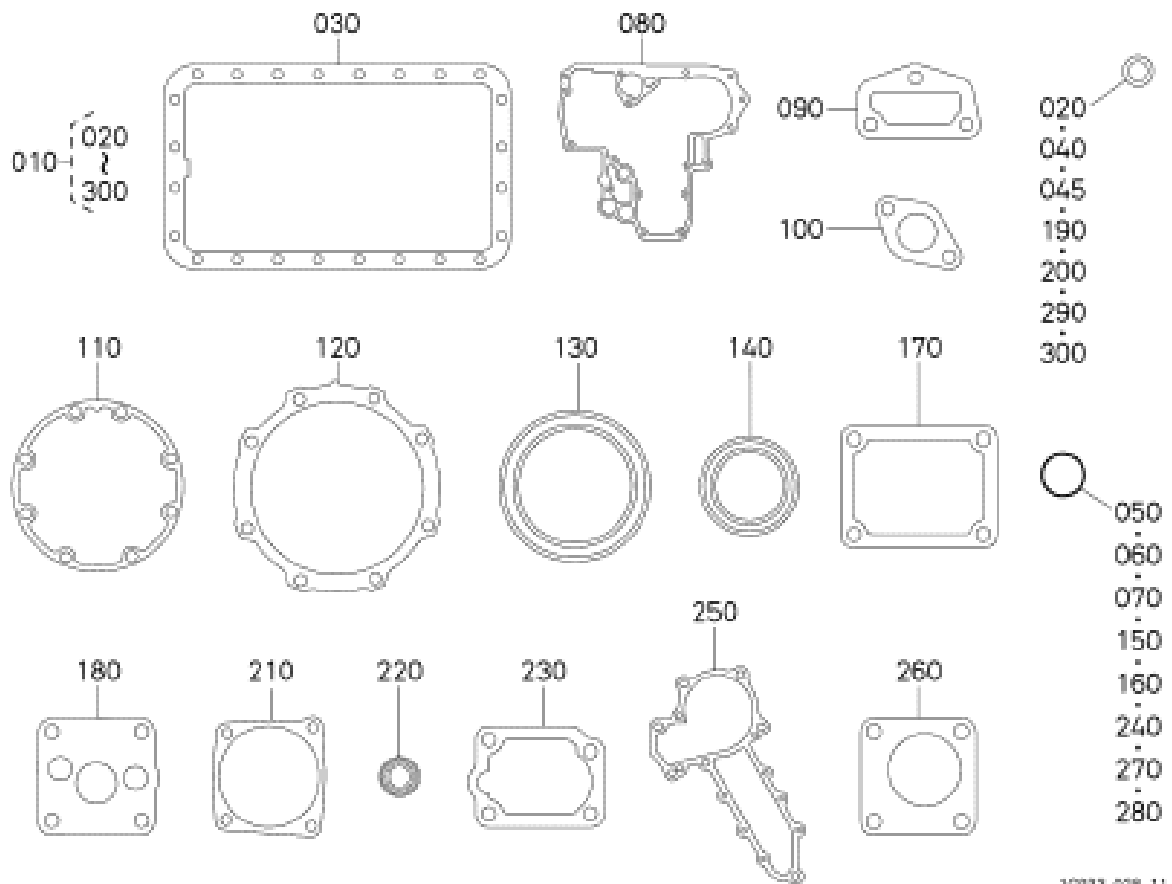
2203 KUBOTA ENGINE UPPER GASKET KIT [OPTION]



1.4/85-004-10

2203 KUBOTA ENGINE UPPER GASKET KIT [OPTION]			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338429	1	KIT-GASKET UPPER
020	3332024	1	WASHER,W/RUBB- 020
030	3338415	8	SEAL-VALVE STEM
040	3338345	1	O-RING
050	3334292	1	GASKET-CYL HEAD KBA 2203 EMIS COMP
060	3338421	1	GASKET-IN-MANIFOLD
070	3338424	1	GASKET-EXHAUST MANIFOLD
075	3338423	1	GASKET-EXHAUST MANIFOLD
080	3334289	1	GASKET-CYL HEAD COVER KBA 2203 EMIS COMP
090	3332432	4	KUBOTA GASKET
100	3331853	4	SEAL, HEAT -070
110	3338405	1	GASKET-WATER FLANGE
120	3336918	1	GASKET - THERMOSTAT KUBOTA
130	3332122	1	GASKET, MUFFLER- 010
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE LOWER GASKET KIT [OPTION]

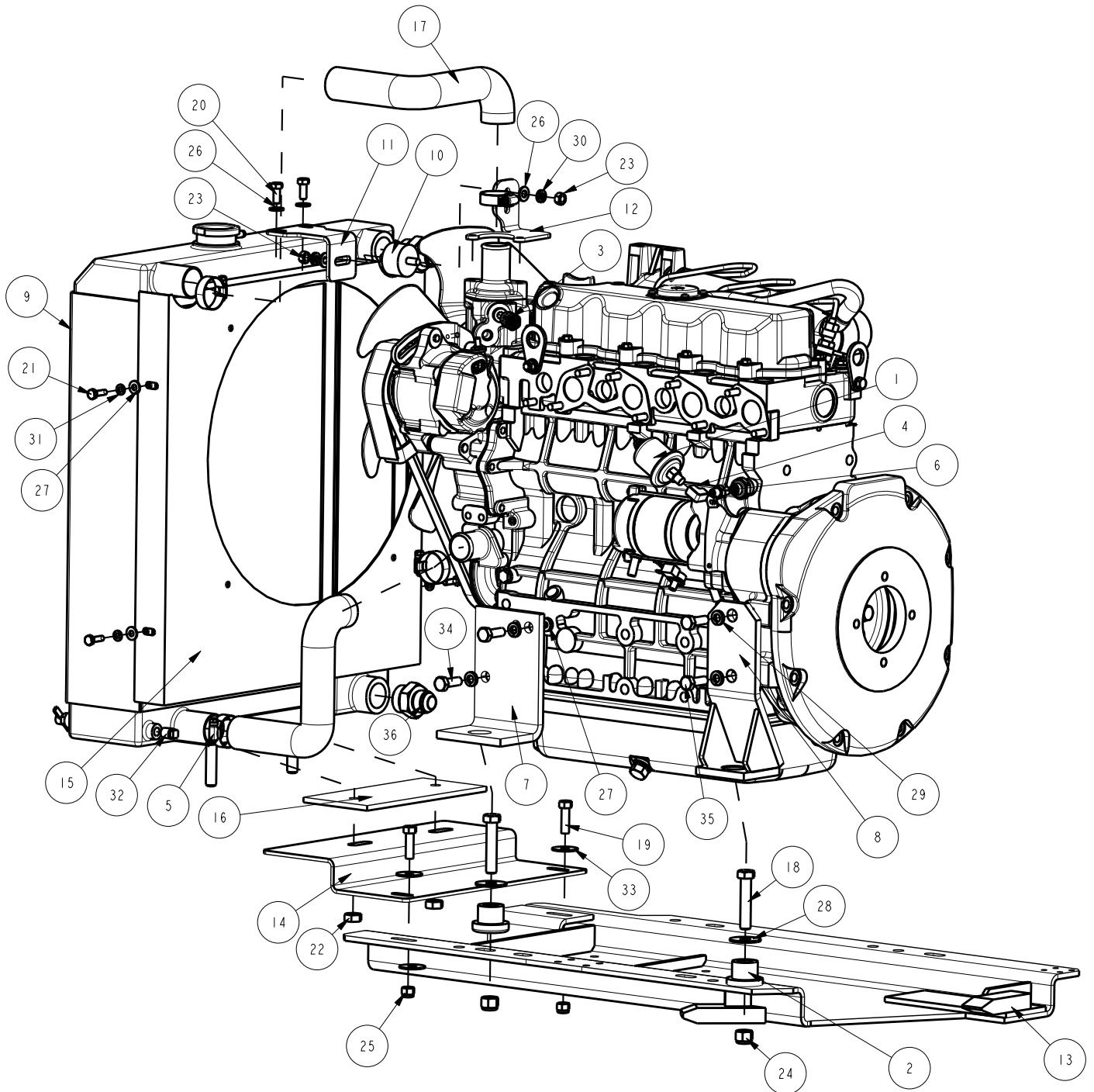


102233-02B-11

PARTS BREAKDOWN

2203 KUBOTA ENGINE LOWER GASKET KIT [OPTION]			
ITEM	PART NO.	REQ'D	DESCRIPTION
010	3338430	1	KIT-GASKET LOWER
020	3338405	1	GASKET-WATER FLANGE
030	3338325	1	GASKET-OIL PAN
040	3305252	1	WASHER-KUBOTA OIL DRAIN FTG
045	3333377	2	GASKET
050	3338334	1	O-RING
060	3338335	2	O-RING
070	3338336	1	O-RING
080	3334301	1	GASKET-TIMING GEAR CASE KBA 2203 EMIS
090	3338342	1	GASKET-RETURN FLANGE
100	3338399	1	GASKET-FUEL PUMP
110	3338355	1	GASKET-BEARING CASE
120	3338357	1	GASKET- CASE COVER
130	3338358	1	SEAL-OIL
140	3330290	1	KBA SEAL OIL
150	3331698	1	O RING - 170
160	3338330	1	O-RING
170	3338351	1	GASKET-PUMP COVER
180	3338348	1	GASKET-OIL PUMP
190	3331828	2	GASKET- 030
200	--XXX--	2	NOT SOLD SEPARATELY
210	3338374	1	GASKET
220	3334298	2	SEAL-SPEED CONT PLATE ASSY KBA 2203 EMIS
230	3334297	2	GASKET-SPEED CONT PLT KBA2203 EMIS COMP
240	3338380	1	O-RING
250	3339010	1	GASKET, WATER PUMP
260	3338343	1	GASKET-HOUR METER
270	--XXX--	1	NOT SOLD SEPARATELY
280	--XXX--	1	NOT SOLD SEPARATELY
290	3338376	1	GASKET
300	3331569	1	GASKET-150
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE - RADIATOR AND SENDERS



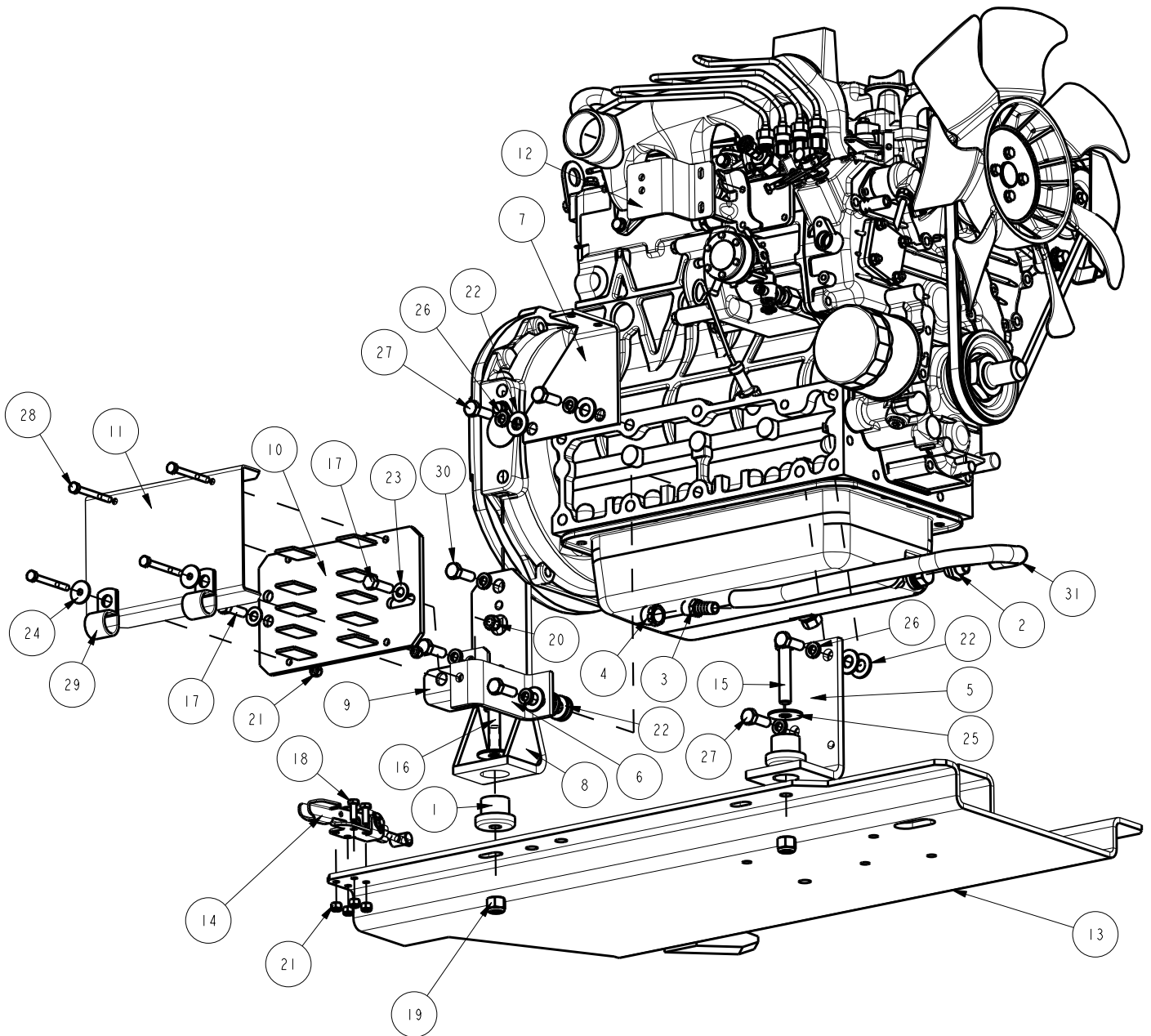
PARTS BREAKDOWN

2203 KUBOTA ENGINE - RADIATOR AND SENDERS

ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300387	1	SENDER-OIL PRESSURE 0-80 PSI
2	3300464	2	ISOLATOR - RUBBER, 1.24 DIAMx1.25 LG
3	3301441	1	SENDER-TEMP A12,A15,& KUBOTA
4	3301720	1	FTG-90 EL 1/8 FPT
5	3303255	4	CLAMP-HOSE 1 3/4 NOM.
6	3305640	1	FTG-NIPPLE 1/8BPT-1/8NPT BRASS
7	3307918	1	MNT-ENG-REAR INNER KBA PNTD
8	3315505	1	MNT-ENGINE KBA INNER
9	3332458	1	RAD/OIL COOLER, 10X, AL
10	3334426	1	ISOLATOR-RAD MOUNT 5/16-18
11	3334427	1	MOUNT - RAD UPPER KBA
12	3334429	1	MOUNT-RAD LOWER KBA 2203
13	3334994	1	WELD-ENGINE PAN, GM 1.6L, ARMA
14	3335591	1	MNT-BTM RAD, V2203 DSL
15	3337999	1	SHROUD-RAD. 10X
16	3341811	1	PAD-RADIATOR MOUNT 5550
17	3350282	2	HOSE-UPPER H25-4 CORE
18	3400019	2	SCR-HEX 1/2-13 X 2.50 ZP
19	3400029	2	SCR-HEX 3/8 -16X1.25 ZP
20	3400036	2	BOLT-HH 5/16-18X3/4
21	3400041	4	SCREW-HHM 1/4-20 X .875 LG ZP
22	3400065	2	NUT-HEX 1/2-13 ZP
23	3400070	2	NUT-HEX 5/16-18 ZP
24	3400078	2	NUT-HEX 1/2-13 ES ZP
25	3400079	2	NUT-HEX 3/8-16 ES ZP
26	3400088	4	WASHER 5/16 ID .688 OD X .065 THK
27	3400089	8	WASHER 1/4 ID .63 OD X .065 THK
28	3400091	4	WASHER-FENDER 1/2 ZP
29	3400098	6	WSR-LOCK 1/2, ZP
30	3400102	2	WSR-LOCK 5/16, ZP
31	3400103	4	WASHER-LOCK 1/4 SPLIT ZP
32	3400256	1	FTG-PIPE PLUG 1/4 MPT
33	3400278	4	WASHER-FENDER 3/8 ZP
34	3400296	2	SCR-HEX M12 X 1.25 X 30 MM, ZP
35	3401663	2	SCR-HEX M14-1.5 X 30 MM ZP

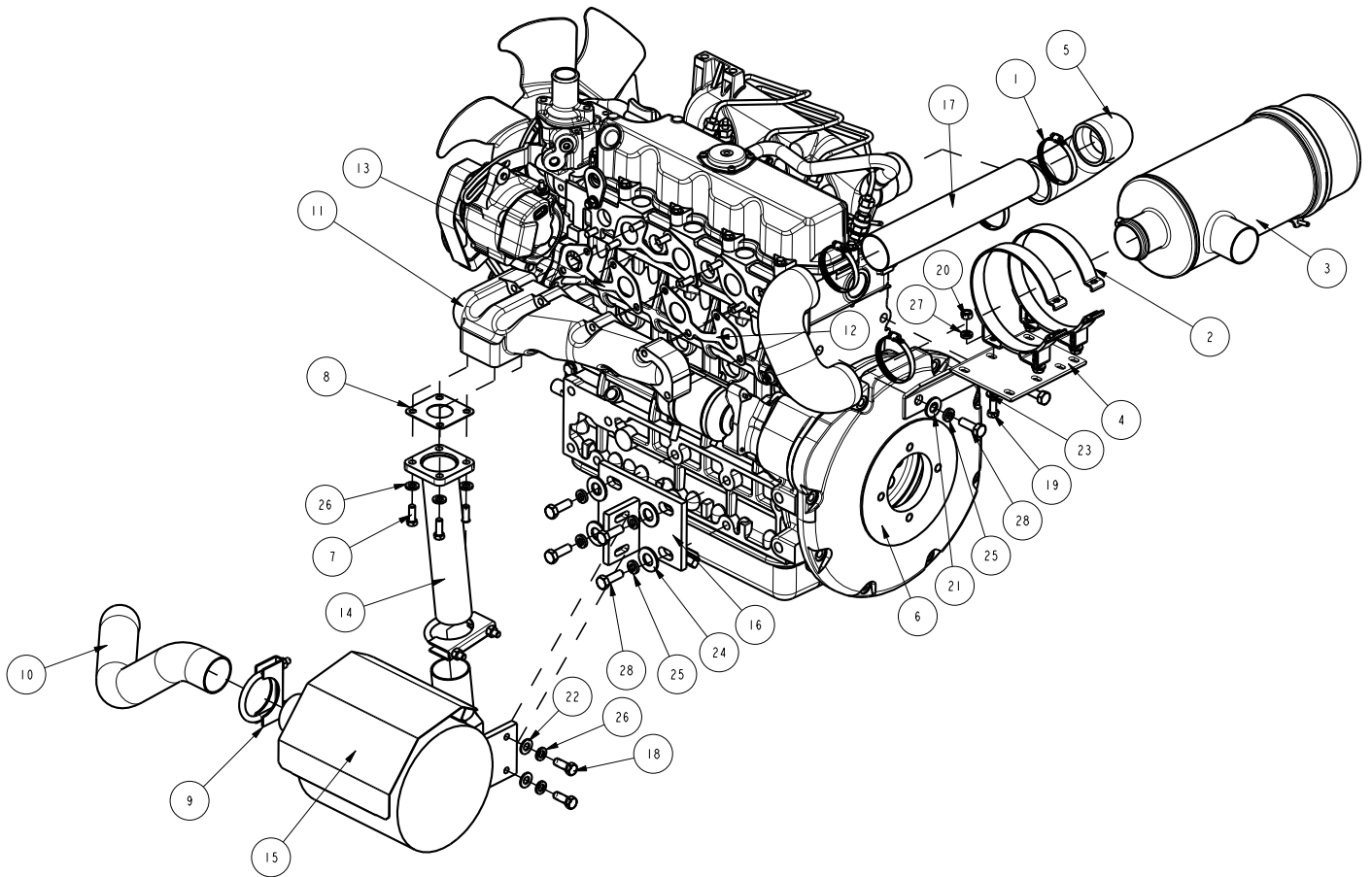
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE - MOUNTS AND HOSE RETAINER



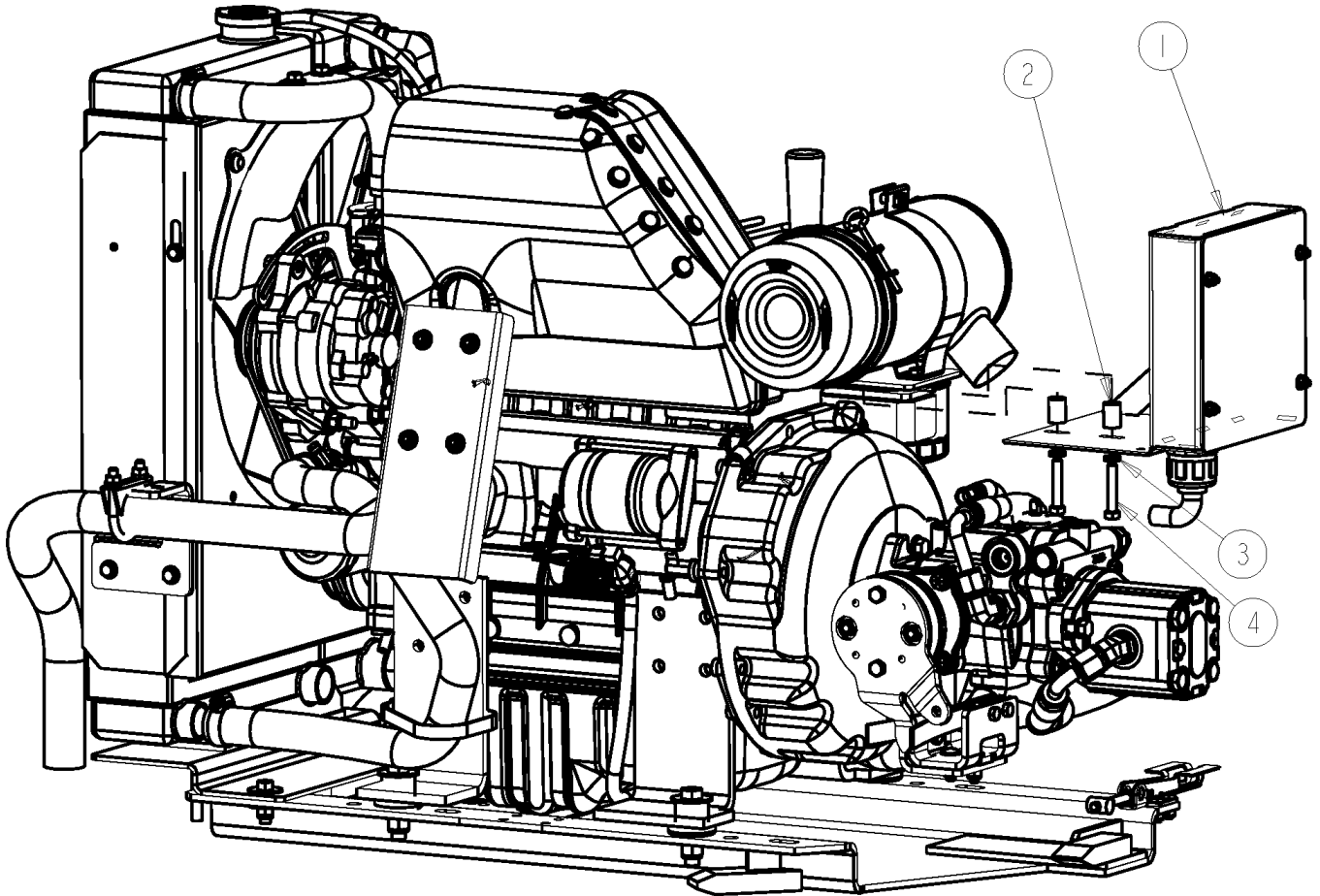
2203 KUBOTA ENGINE - MOUNTS AND HOSE RETAINER			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300464	2	ISOLATOR - RUBBER, 1.24 DIAMx1.25 LG
2	3305251	1	FTG-OIL PAN DRAIN KUBOTA
3	3307829	1	FTG-HOSE BARB 1/2 X 3/8 MPT
4	3307830	1	FTG-CAP 3/8 FPT
5	3307919	1	MNT-ENG-REAR OUTER KBA PNTD
6	3307935	1	BRKT-HOSE RETAIN KBA DSL PNTD
7	3307955	1	MNT-FUEL FILTER KBA DSL PNTD
8	3315501	1	MNT-ENGINE KBA OUTER
9	3315508	1	MNT-HOSE RETAINER BRKT
10	3333302	1	WELD - HOSE RETAINER SW/A
11	3333303	1	COVER - HOSE RETAINER SHORT
12	3334083	1	BRKT-THROTTLE CABLE KBA 2203
13	3334994	1	WELD-ENGINE PAN, GM 1.6L, ARMA
14	3337544	1	LATCH - ENGINE SWING
15	3400019	1	SCR-HEX 1/2-13 X 2.50 ZP
16	3400020	1	SCR-HEX,1/2-13 X 2.00 ZP
17	3400029	2	SCR-HEX 3/8 -16X1.25 ZP
18	3400042	4	SCR-HEX 1/4-20X.75 ZP
19	3400078	2	NUT-HEX 1/2-13 ES ZP
20	3400079	2	NUT-HEX 3/8-16 ES ZP
21	3400081	8	NUT-HEX 1/4-20 ES ZP
22	3400086	11	WASHER-FLAT 1/2 STANDARD ZP
23	3400087	2	WASHER 3/8 ID .81 OD X .065 THK
24	3400090	2	WASHER 1/4 ID 1.0 OD X .074 THK
25	3400091	2	WASHER-FENDER 1/2 ZP
26	3400098	7	WSR-LOCK 1/2, ZP
27	3400296	5	SCR-HEX M12 X 1.25 X 30 MM, ZP
28	3400433	4	SCR-HEX,1/4-20X2.50 ZP
29	3400999	2	CLAMP- P TYPE 1 DIA, ZP VINYL COATED
30	3401663	2	SCR-HEX M14-1.5 X 30 MM ZP
31	3500135	1	HOSE-1/2 ID EEC-PCV
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE - AIR AND EXHAUST



2203 KUBOTA ENGINE - AIR AND EXHAUST			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3044112	4	CLAMP - HOSE, DIA. 2.5" SS
2	3300459	2	BAND-MTG AIR CLEANER PNTD BLK
3	3303031	1	AIR CLNR - HEAVY DUTY
-	3302842	1	ELEMENT-AIR CLNR/METAL (NOT SHOWN)
-	3302597	1	ELEMENT-AIR CLNR/METAL SAFETY (NOT SHOWN)
4	3315500	1	MNT-AIR CLEANER HAYES
5	3315676	2	HOSE-AIR INTAKE MANIF. ARMA
6	3321178	1	ENGINE PAN, GM 1.6L
7	3331507	4	BOLT-060
8	3332122	1	GASKET, MUFFLER
9	3335989	2	CLAMP-EXHAUST UNIVERSAL 2-1/8" DIA (SP)
10	3338212	1	TAILPIPE - 10X 2" DIA
11	3338422	1	MANIFOLD,EXHAUST
12	3338423	1	GASKET,EX-MANIFOLD
13	3338424	1	GASKET,EX-MANIFOLD
14	3338431	1	WDT-EXHAUST PIPE
15	3338432	1	MUFFLER
16	3338433	1	MUFFLER BRKT
17	3350248	1	TUBE-AIR INTAKE 10X
18	3400030	2	SCREW-HHM 3/8-16 X 1.0 LG ZP
19	3400036	4	BOLT-HH 5/16-18X3/4
20	3400070	4	NUT-HEX 5/16-18 ZP
21	3400086	2	WASHER-FLAT 1/2 STANDARD ZP
22	3400087	2	WASHER 3/8 ID .81 OD X .065 THK
23	3400088	4	WASHER 5/16 ID .688 OD X .065 THK
24	3400094	4	WASHER-FLAT 5/8 ZP
25	3400098	6	WSR-LOCK 1/2, ZP
26	3400101	6	WASHER-LOCK 3/8 SPLIT ZP
27	3400102	4	WSR-LOCK 5/16, ZP
28	3400296	6	SCR-HEX M12 X 1.25 X 30 MM, ZP
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

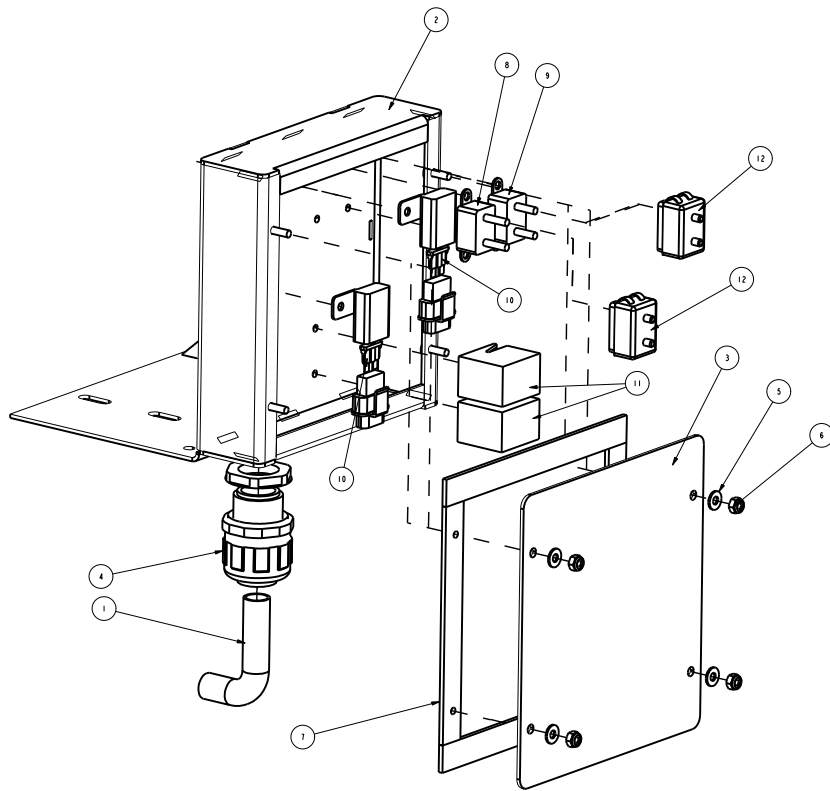
2203 KUBOTA ENGINE - FUSE PANEL



2203 KUBOTA ENGINE - FUSE PANEL			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3336080	1	ASSY-FUSE BOX COMPLETE
2	3342109	2	SPACER
3	3400102	2	WASHER
4	3401513	2	BOLT

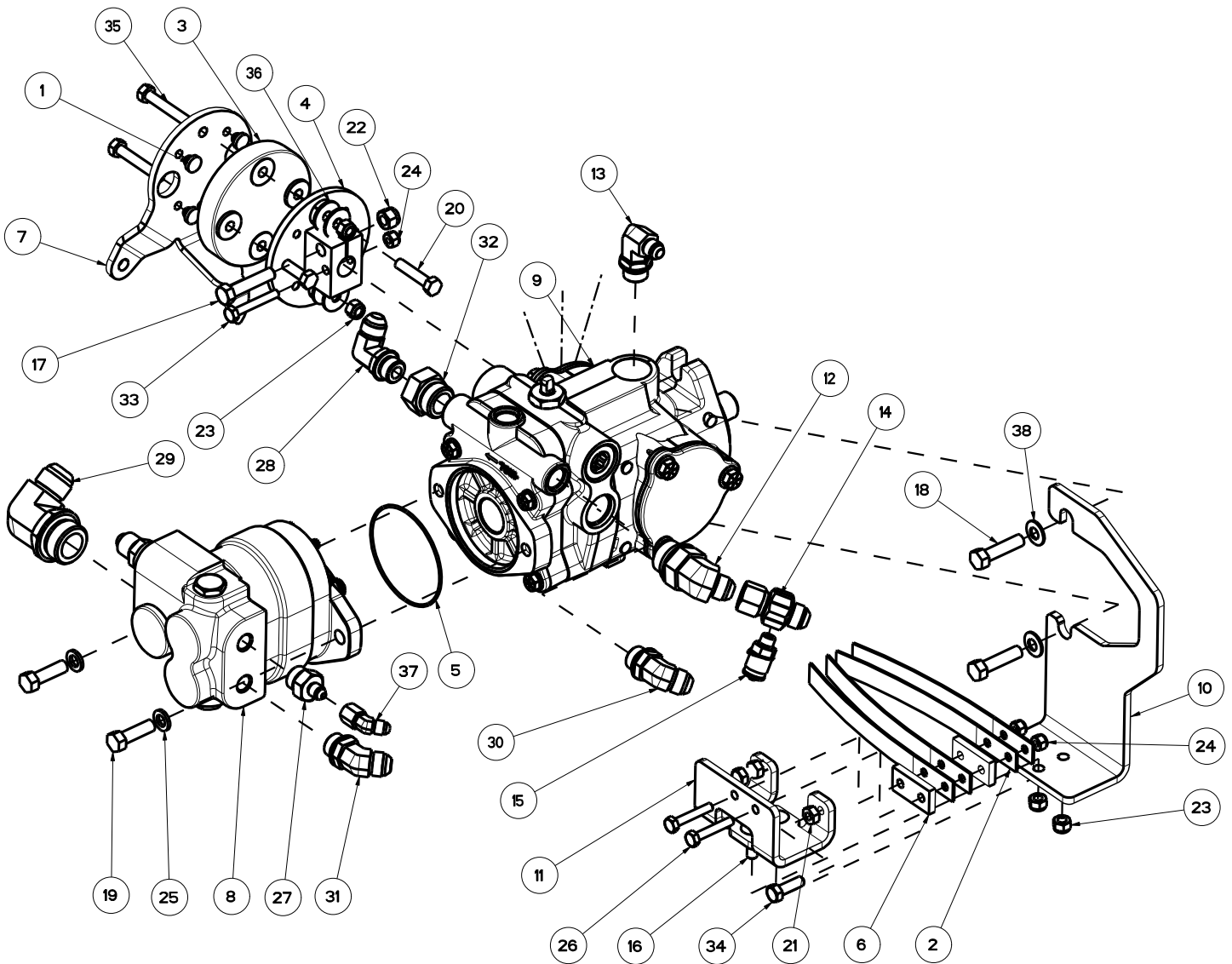
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

2203 KUBOTA ENGINE - FUSE BOX DETAIL



2203 KUBOTA ENGINE - FUSE BOX DETAIL			
ITEM	PART NO.	REQ'D	DESCRIPTION
1	3335664	1	KIT-PANEL W/WIRING HARNESS (Includes Items 8-11)
2	3336073	1	WELD-FUSE BOX
3	3336077	1	PLT-COVER FUSE BOX
4	3336079	1	FTG-CONDUIT 1" FLEX CONNECTOR
5	3400095	4	WASHER-FLAT #10 ZP
6	3400172	4	NUT-HEX JAM #10-32 ES ZP
7	3500246	2.375'	GASKET-OPEN CELL, 1/8x3/4
8	3334051	1	BREAKER-40 AMP DIESEL
9	3334052	1	BREAKER-30 AMP DIESEL
10	3335329	2	FUSE - 10 AMP
11	3344053	2	RELAY-SPDT DIESEL
12	3342910	2	BOOT-INSULATOR-RED FOR CIRCUIT BREAKER
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE - HYDRAULIC PUMP DETAIL

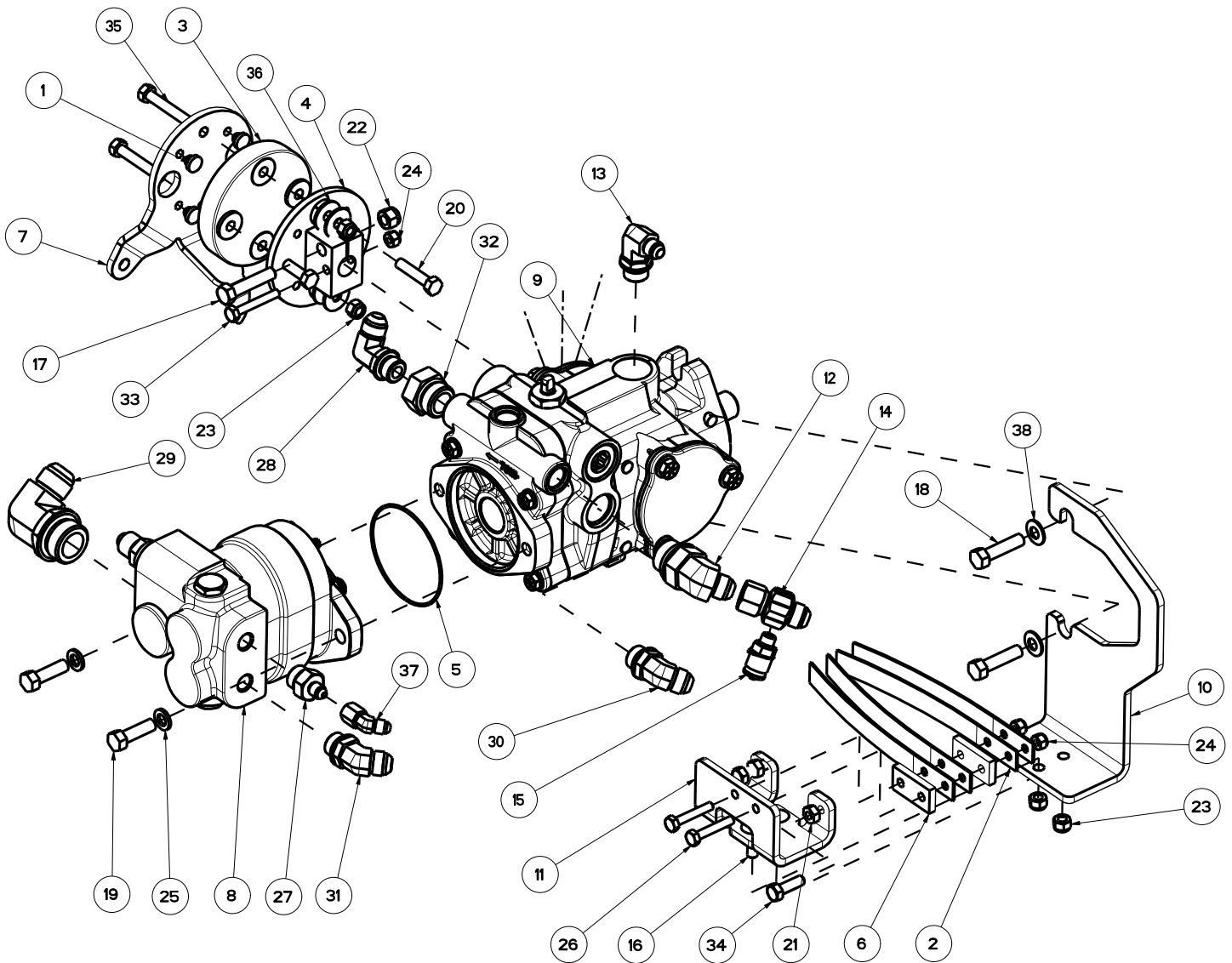


PARTS BREAKDOWN

2203 KUBOTA ENGINE - HYDRAULIC PUMP DETAIL

ITEM	PART NO.	REQ'D	DESCRIPTION
1	3300526	8	BUMPER-RUBBER 1/4 ID X 1/8 THK
2	3300543	4	SPRING-FWD/REV RETURN
3	3301507	1	COUPLING-RUBBER, DIR CONTROL
4	3301544	1	WELD-DISC FWD/REV
5	3303711	1	O RING-STATIC SEAL 3.239 ID
6	3303918	2	SPACER-FWD/REV BRACKET
7	3307219	1	PLT-DIRECTIONAL CONT PLTD
8	3321397	1	PUMP-HYDRAULIC AUX W/FLOW DIVIDER
9	3335072	1	PUMP-PISTON, VARIABLE, 1.44 CI
10	3335200	1	PLT - FWD/REV SPRING MNT V1505
11	3335301	1	BRACKET - FWD/REV . 9X
12	3335709	1	FTG-45° 1-1/16-12 X 1/2", STR#12-JIC37°#8
13	3341130	1	FTG-90 3/4-16 TO #6
14	3342204	1	FTG-GAUGE PORT
15	3342205	1	COUPLING-TEST 4 MALE 0-ROMG (7/16-20)
16	3400009	2	SCR-CAR,5/16-18X1.00
17	3400027	1	SCR-HEX,3/8-16X1.75
18	3400028	2	SCR-HEX,3/8-16x1.50
19	3400029	2	SCR-HEX, 3/8-16x1.25
20	3400033	2	SCR-HEX,5/16-18X1.50
21	3400069	2	NUT-HEX 5/16-24
22	3400079	1	NUT-HEX 3/8-16 ES
23	3400080	6	NUT-HEX 5/16-18 ES
24	3400081	3	NUT-HEX 1/4-20 ES
25	3400101	2	WASHER-LOCK 3/8 SPLIT
26	3400149	2	SCR-HEX,1/4-20x1.50
27	3400150	1	FTG-STR 3/4-16 TO #4
28	3400154	1	FTG-90 3/4-16 TO #8
29	3400156	1	FTG-90 1 5/16-12 TO #16
30	3400157	1	FTG-45° 3/4-16 TO #8
BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS			

2203 KUBOTA ENGINE - HYDRAULIC PUMP DETAIL (CONTUIED)



PARTS BREAKDOWN**2203 KUBOTA ENGINE - HYDRAULIC PUMP DETAIL (CONTUIED)**

ITEM	PART NO.	REQ'D	DESCRIPTION
31	3400158	1	FTG-45° 7/8-14 TO #8
32	3400167	1	FTG-ADAPTER 1 1/6-12 EXT
33	3400173	1	SCR-HEX,1/4-20X1.75
34	3400221	2	SCR-HEX,5/16-24X1.00
35	3400231	2	SCR-HEX,5/16-18X2.0
36	3400233	4	WASHER-FENDER 5/16 1.00 OD
37	3400248	1	FTG-SWIVEL 45 ELL #4JIC 1/4
38	3400385	2	WASHER-CONICAL SPRING 3/8

BOXES WITH --XXX-- ARE NOT AVAILABLE SEPARATELY & BLANKS ARE NOT USED IN VIEWS

Revision G
Effective September 2010
PowerBoss Made Simple Industrial Limited Warranty

Minuteman International owner of PowerBoss warrants to the original purchaser/user that the product is free from defects in workmanship and materials under normal use. PowerBoss will, at its option, repair or replace without charge, parts that fail under normal use and service when operated and maintained in accordance with the applicable operation and instruction manuals. All warranty claims must be submitted through and approved by factory authorized repair stations.

This warranty does not apply to normal wear, or to items whose life is dependent on their use and care. Parts not manufactured by PowerBoss are covered by and subject to the warranties and/or guarantees of their manufacturers. Please contact Minuteman International for procedures in warranty claims against these manufacturers.

Special warning to purchaser -- Use of replacement parts not manufactured by PowerBoss or its designated licensees, will void all warranties expressed or implied. A potential health hazard exists without original equipment replacement.

All warranted items become the sole property of Minuteman International or PowerBoss or its original manufacturer, whichever the case may be.

PowerBoss disclaims any implied warranty, including the warranty of merchantability and the warranty of fitness for a particular purpose. PowerBoss assumes no responsibility for any special, incidental or consequential damages.

This limited warranty is applicable only in the U.S.A. and Canada, and is extended only to the original user/purchaser of this product. Customers outside the U.S.A. and Canada should contact their local distributor for export warranty policies. PowerBoss is not responsible for costs or repairs performed by persons other than those specifically authorized by PowerBoss. This warranty does not apply to damage from transportation, alterations by unauthorized persons, misuse or abuse of the equipment, use of non-compatible chemicals, or damage to property, or loss of income due to malfunctions of the product. If a difficulty develops with this machine, you should contact the dealer from whom it was purchased.

This warranty gives you specific legal rights, and you may have other rights, which vary from state to state. Some states do not allow the exclusion or limitation of special, incidental or consequential damages, or limitations on how long an implied warranty lasts, so the above exclusions and limitations may not apply to you.

	Travel*	Labor	Parts	Engine	Extended Warranty	Costs
Walk behinds						
Battery sweepers	Ninety days	One year	One year	N/A	2 years Parts + Labor (or 2000 Hours)	2%
IC sweepers	Ninety days	One year	One year	Through manufacturer	2 years Parts + Labor (or 2000 Hours)	2%
Battery scrubbers	Ninety days	Two years	Three years	N/A	3 Years Parts + Labor (or 3000 Hours)	2%
Riders						
Battery scrubbers	Ninety days	Two years	Three years/2000 hrs	N/A	3 Years Parts + Labor (or 3000 Hours)	2%
IC sweeper/scrubbers	Ninety days	Six months	Two years/2000 hrs	Two years/3000 hrs**	2 years Parts + Labor (or 2000 Hours)	3%
IC sweepers	Ninety days	Six months	Four years/3000 hrs	Five years/3000 hrs**	4 Years Parts + 2 Years Labor (or 4000 Hours)	3%
Exceptions						
Apex series sweeper	Ninety days	One year	One year/1000 hrs	One year/1000 hrs**	2 years Parts + Labor (or 2000 Hours)	3%
6X sweeper	Ninety days	Six months	Two years/2000 hrs	Two years/2000 hours**	2 years Parts + Labor (or 2000 Hours)	3%
Other Products						
QRE-3001A	Ninety days	Six months	Two years/2000 hrs	Two years/3000 hours**	2 years Parts + Labor (or 2000 Hours)	3%

Tank Bladders Eight years/ no additional labor
Polyethylene plastic tanks Ten years/ no additional labor
Batteries 0-3 months full replacement, 4-12 prorated credit
Chargers One-year replacement
Replacement parts Ninety days
*Two-hour cap

**Through engine manufacturer. See section 3 of warranty manual for engine warranty exceptions

*** Based upon dealer's certification status

Extended Warranty MUST be signed up within 30 days of delivery to End User (Dealer has 1Year from Receiving Machine to Sign up extended Warranty)

Extended Warranty Cost is based on Invoice Price multiplied by the Percentage listed in the Extended Warranty Column

All above labor and travel reimbursed at 65 or 75% of the published shop rate.



“The Power of Clean”

**PowerBoss Is A Full Line Manufacturer Of Sweepers and Scrubbers For
Industrial Facilities.**

PowerBoss, Inc 175 Anderson Street P.O. Box 1227- Aberdeen North Carolina 28315

Phone: 800-982-7141 - Fax: 1-800-277-7141 Local: 910-944-2105 Fax: 910-944-7409 e-mail: techsupport@powerboss.com

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