










YAMAHA

SJ700AU

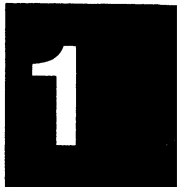
Service Manual

LIT-18616-01-43

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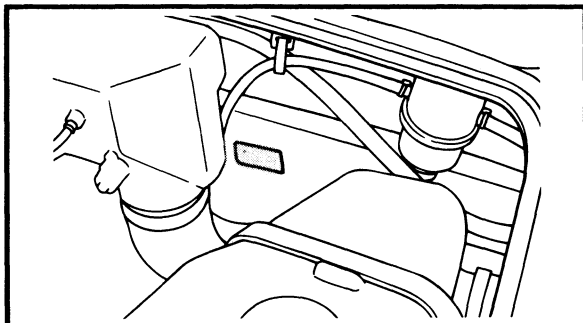
**CHAPTER 1
GENERAL INFORMATION**



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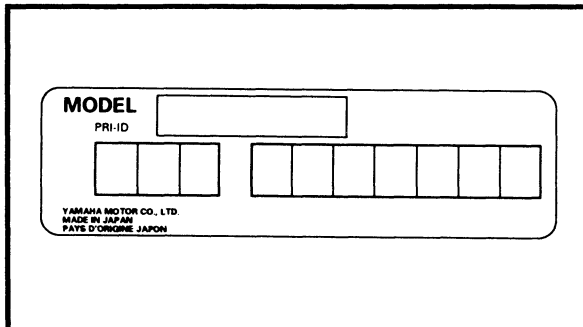
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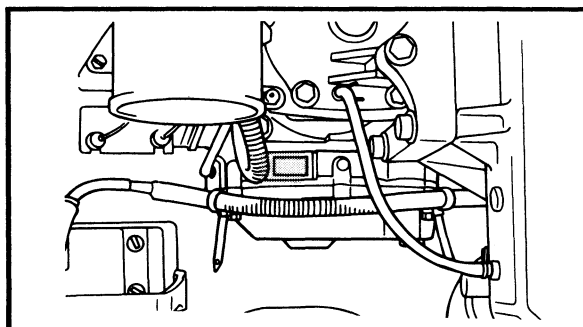
A60700-0*

**IDENTIFICATION NUMBERS
PRIMARY I.D. NUMBER**

The primary I.D. number is stamped on a label attached to the inside of the engine compartment.



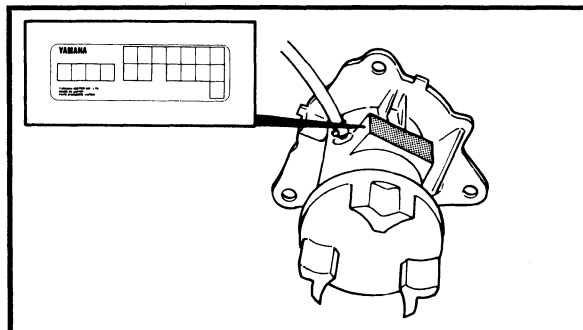
Starting primary I.D. number:
GM6: 900101 ~,
910101 ~ (FRA),
930101 ~ (GUM, AUS)



ENGINE SERIAL NUMBER

The engine serial number is stamped on a label attached to the crankcase.

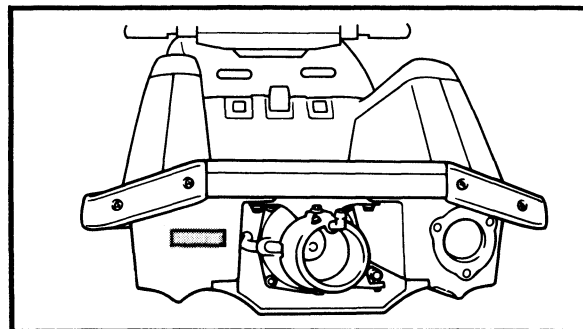
Starting serial number:
64V: 000101 ~



PUMP SERIAL NUMBER

The jet pump unit serial number is stamped on a label attached on the intermediate housing.

Starting serial number:
64V: 500101 ~

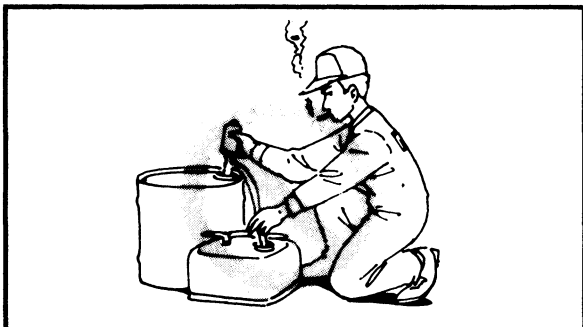


**HULL IDENTIFICATION NUMBER
(H.I.N.)**

The H.I.N. is stamped on a plate attached to the hull beside the jet nozzle.

SAFETY WHILE WORKING

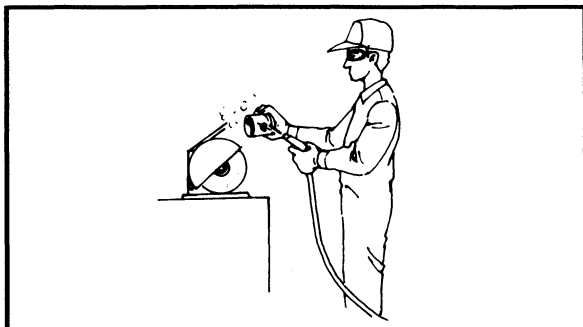
The procedures given in this manual are those recommended by Yamaha to be followed by Yamaha dealers and their mechanics.

**FIRE PREVENTION**

Gasoline (petrol) is highly flammable. Petroleum vapor is explosive if ignited. Do not smoke while handling gasoline (petrol), and keep it away from heat, sparks, and open flames.

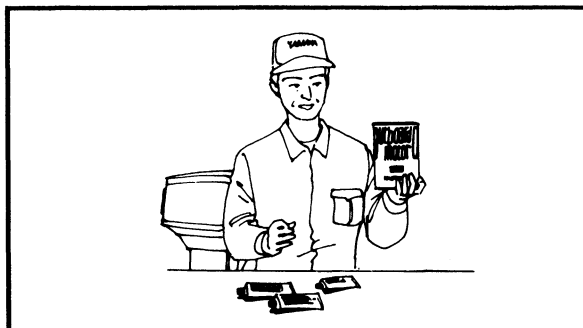
VENTILATION

Petroleum vapor is heavier than air and if inhaled in large quantities will not support life. Engine exhaust gases are harmful to breathe. When test-running an engine indoors, maintain good ventilation.

**SELF-PROTECTION**

Protect your eyes with suitable safety spectacles or safety goggles when using compressed air, when grinding or when doing any operation which may cause particles to fly off.

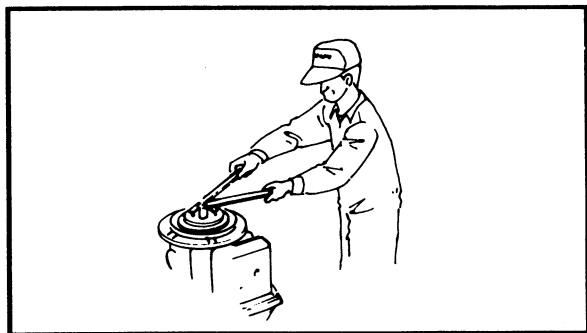
Protect hands and feet by wearing safety gloves or protective shoes if appropriate to the work you are doing.

**OILS, GREASES AND SEALING
FLUIDS**

Use only genuine Yamaha oils, greases and sealing fluids or those recommended by Yamaha.

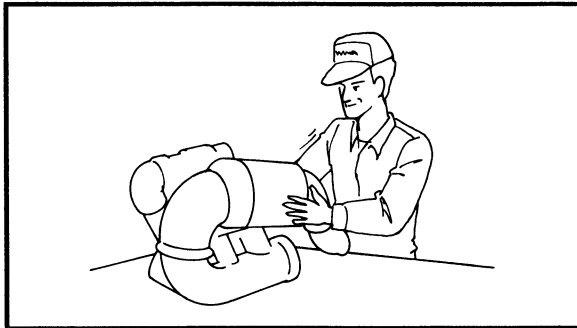
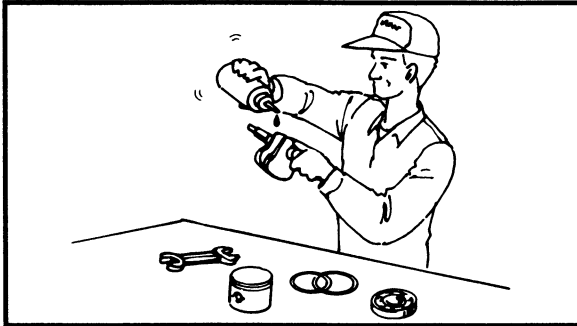
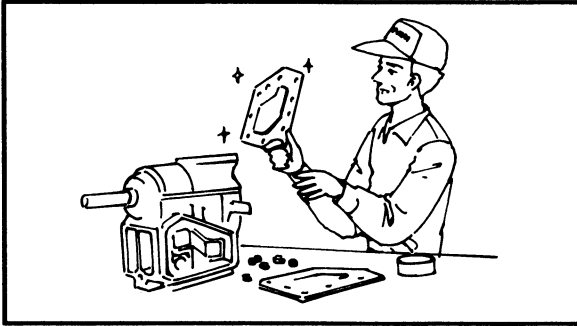
Under normal conditions of use, there should be no hazards from the use of the lubricants mentioned in this manual, but safety is all-important, and by adopting good safety practises, any risk is minimized. A summary of the most important precautions is as follows

1. While working, maintain good standards of personal and industrial hygiene.
2. Clothing which has become contaminated with lubricants should be changed as soon as practicable, and laundered before further use.
3. Avoid skin contact with lubricants; do not, for example, place a soiled wiping-rag in one's pocket.
4. Hands, and any other part of the body which have been in contact with lubricants or lubricant-contaminated clothing, should be thoroughly washed with hot water and soap as soon as practicable.
5. To protect the skin, the application of a suitable barrier cream to the hands before working is recommended.
6. A supply of clean lint-free cloths should be available for wiping purposes.



GOOD WORKING PRACTICES

1. The right tools
Use the special tools that are designed to protect parts from damage. Use the right tool in the right manner — don't improvise.
2. Tightening torque
Follow the torque tightening instructions. When tightening bolts, nuts and screws, tighten the larger sizes first, and tighten inner-positioned fixings before outer-positioned ones.



3. Non-reusable items

Always use new gaskets, packings, O-rings, oil seals, split-pins and circlips etc. on reassembly.

DISASSEMBLY AND ASSEMBLY

1. Clean parts with compressed-air on disassembling them.
2. Oil the contact surfaces of moving parts on assembly.

3. After assembly, check that moving parts operate normally.

4. Install bearings with the manufacturer's markings on the side exposed to view, and liberally oil the bearings.

CAUTION:

Do not use compressed air to spin the bearings dry. This causes damage to the bearing surfaces.

5. When installing oil seals, apply a light coating of water-resistant grease to the outside diameter.

SPECIAL TOOLS

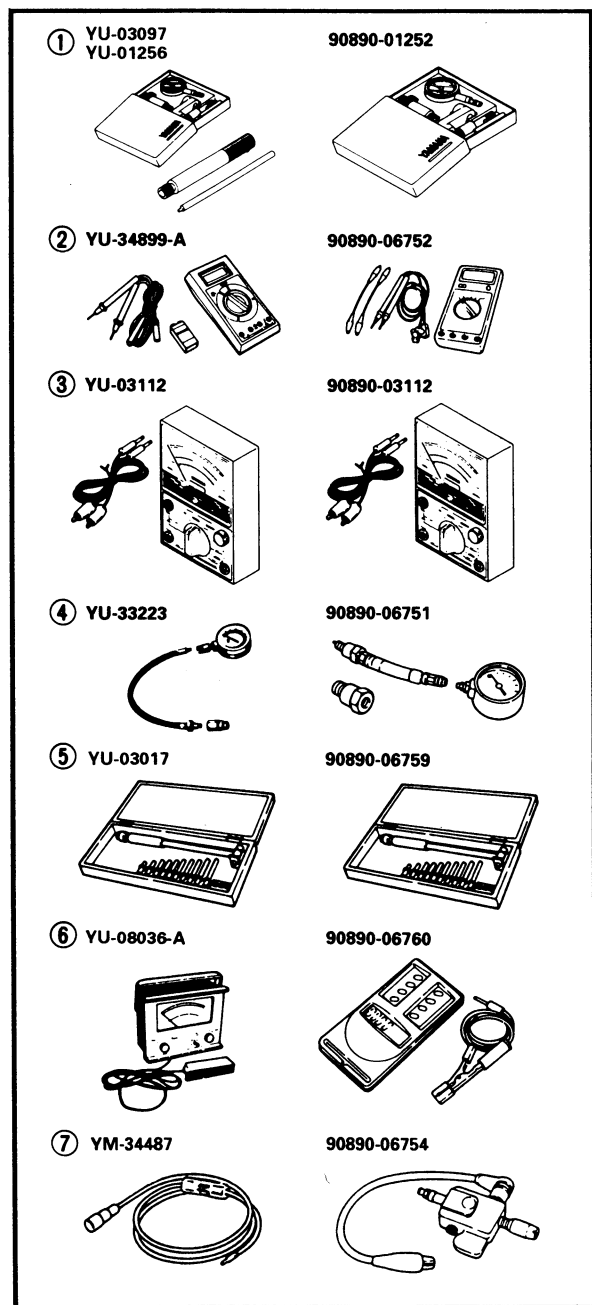
Use of the correct special tools recommended by Yamaha will aid the work and enable accurate assembly and tune-up. Improvisations and use of improper tools can cause damage to the equipment.

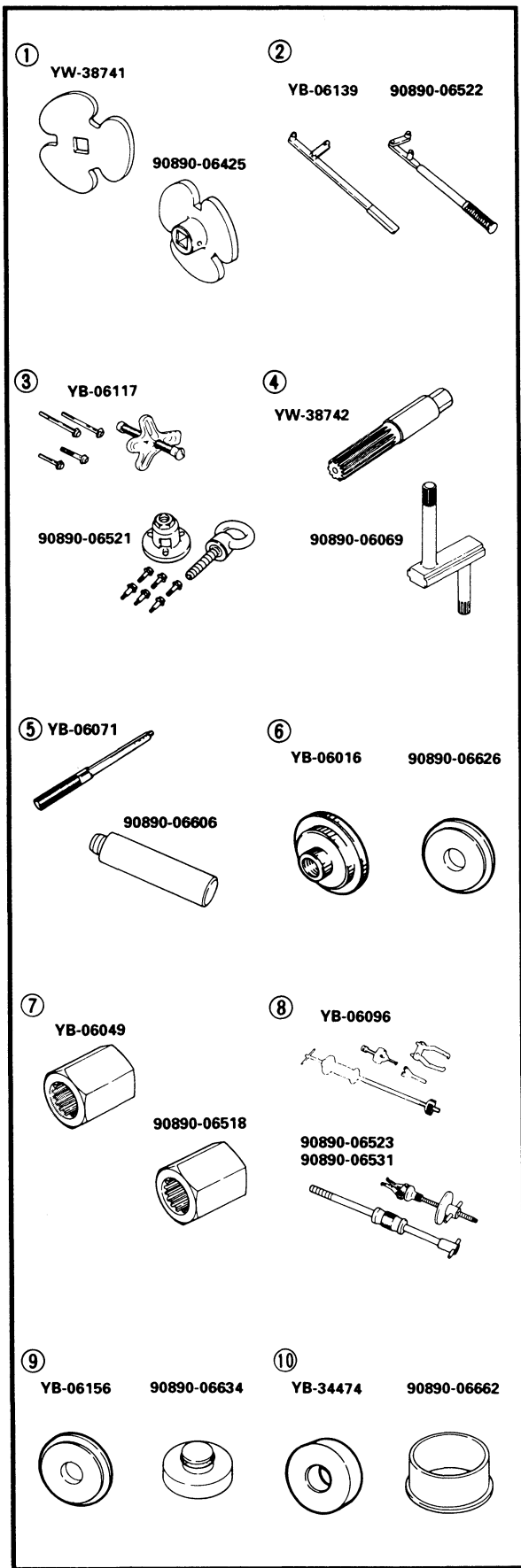
NOTE:

- For U.S.A. and Canada, use part numbers starting with "YB-", "YU-" or "YW-".
- For other countries, use part numbers starting with "90890-".

MEASURING

1. Dial gauge and stand
P/N. YU-03097, YU-01256
90890-01252
2. Digital multi meter
P/N. YU-34899-A
90890-06752
3. Pocket tester
P/N. YU-03112
90890-03112
4. Compression gauge
P/N. YU-33223
90890-06751
5. Cylinder gauge set
P/N. YU-03017
90890-06759
6. Engine tachometer
P/N. YU-08036-A
90890-06760
7. Spark gap tester
P/N. YM-34487
90890-06754





REMOVAL AND INSTALLATION

1. Coupler wrench
P/N. YW-38741
90890-06425
2. Flywheel holder
P/N. YB-06139
90890-06522
3. Flywheel puller
P/N. YB-06117
90890-06521
4. Shaft holder (Intermediate shaft)
P/N. YW-38742
90890-06069
5. Driver rod
(Intermediate shaft and jet pump)
P/N. YB-06071
90890-06606
6. Bearing outer race attachment
(Intermediate shaft)
P/N. YB-06016
90890-06626
7. Drive shaft holder (Impeller)
P/N. YB-06049
90890-06518
8. Slide hammer set (Jet pump bearing)
P/N. YB-06096
90890-06523
90890-06531
9. Ball bearing attachment
(Jet pump oil seal)
P/N. YB-06156
90890-06634
10. Bearing inner race attachment
(Jet pump bearing)
P/N. YB-34474
90890-06662



CHAPTER 2 SPECIFICATIONS

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GENERAL SPECIFICATIONS

Item	Unit	Model
		SJ700A
DIMENSIONS:		
Length	mm (in)	2,240 (88.2)
Width	mm (in)	680 (26.8)
Height	mm (in)	660 (26.0)
Dry weight	kg (lb)	132 (291)
PERFORMANCE:		
Maximum speed	km/h (mph)	73 (45.4)
Maximum output	kW (hp) @r/min	53.7 (73) @6,300
Maximum fuel consumption	ℓ /h (US gal/h, Imp gal/h)	29 (7.7, 6.4)
Crusing range (at full throttle)	hr.	0.6
ENGINE:		
Engine type		2-stroke
Number of cylinders		2
Displacement	cm ³ (cu. in)	701 (42.78)
Bore × stroke	mm (in)	81 × 68 (3.19 × 2.68)
Compression ratio		7.2 : 1
Intake system		Reed valve
Carburetor type		Floatless type
Number of carburetor		2
Carburetor starting system		Choke
Scavenging system		Loop charged
Lubrication system		Pre-Mixed fuel and oil
Cooling system		Water-cooled
Starting system		Electric starter
Ignition system		C.D.I.
Ignition timing	Degree	15 BTDC ~ 21 BTDC
Spark plug (NGK)		B8HS/BR8HS
Battery capacity	V/kC (A•h)	12/68.4 (19)
Lighting coil	A @r/min	2 ~ 4 @5,500
DRIVE UNIT:		
Propulsion system		Jet pump
Jet pump type		Axial flow, single stage
Impeller rotation (rear view)		Counter clockwise
Transmission		Direct drive from engine
Nozzle angle	Degree	18.5, 20.5, 22.5, 24.5
FUEL AND OIL:		
Fuel		Regular gasoline
Engine oil type		2 stroke outboard motor oil
Engine oil grade		TC-W3
Fuel and oil mixing ratio (wide open throttle)		50 : 1
Fuel tank capacity	ℓ (US gal, Imp gal)	18 (4.8, 4.0)
reserve	ℓ (US gal, Imp gal)	5.5 (1.5, 1.2)



MAINTENANCE SPECIFICATIONS

ENGINE

Item	Unit	Model
		SJ700A
Cylinder head: Warpage limit	mm (in)	0.1 (0.004)
Cylinder: Bore size	mm (in)	81.00 ~ 81.02 (3.189 ~ 3.190)
Wear limit	mm (in)	81.10 (3.193)
Taper limit	mm (in)	0.08 (0.003)
Out of round limit	mm (in)	0.05 (0.002)
Piston: Piston size	mm (in)	80.925 ~ 80.950 (3.186 ~ 3.187)
Measuring point*	mm (in)	10 (0.4)
Piston clearance	mm (in)	0.070 ~ 0.075 (0.0028 ~ 0.0030)
Wear limit	mm (in)	0.125 (0.0049)
Piston ring: Type		Keystone
Sectional sketch (B × T)	mm (in)	1.2 × 2.9 (0.047 × 0.114)
Side clearance	mm (in)	0.01 ~ 0.03 (0.0004 ~ 0.0012)
End gap (installed)	mm (in)	0.2 ~ 0.4 (0.008 ~ 0.016)
Piston pin: Outside diameter	mm (in)	19.995 ~ 20.000 (0.7872 ~ 0.7874)
Limit	mm (in)	19.98 (0.786)
Crankshaft: Crank width "A"	mm (in)	61.95 ~ 62.00 (2.439 ~ 2.441)
Run out limit "B"	mm (in)	0.05 (0.002)
Connection rod big end clearance "C"	mm (in)	0.25 ~ 0.75 (0.010 ~ 0.030)
Small end free play limit "D"	mm (in)	2.0 (0.08)
Carburetor: Stamped mark		64U00F/R
Main nozzle	∅ mm (in)	2.5 (0.10)
Main jet 2 (M.J.2)		130
Pilot jet (P.J.)		70
Low speed screw	Turns out	7/8 ± 1/4
Throttle valve (Th. V.)		190
Valve seat (V.S.)	∅ mm (in)	1.5 (0.06)
High speed screw	Turns out	1-1/8 (F), 1-1/2 (R) ± 1/4
Trolling speed	r/min	1,300 ± 50
Reed valve: Thickness	mm (in)	0.2 (0.008)
Valve lift	mm (in)	9.0 ± 0.2 (0.35 ± 0.01)
Bending limit	mm (in)	0.2 (0.008)



JET UNIT

Item	Unit	Model
		SJ700A
Jet pump:		
Impeller clearance	mm (in)	0.3 ~ 0.4 (0.01 ~ 0.02)
Service limit	mm (in)	0.6 (0.024)
Impeller shaft run out	mm (in)	0.3 (0.012)

ELECTRICAL

Item	Unit	Model
		SJ700A
Ignition system:		
Type		CDI magneto
Ignition timing at 1,200 rpm	Degree	15 BTDC
at 5,500 rpm	Degree	21 BTDC
Stator:		
Model/Manufacturer		F-2192HR/MITSUBISHI
Pulser coil resistance (color)	Ω	12.6 ~ 15.4 (W/R – B)
Charging coil resistance (color)	Ω	497.7 ~ 608.3 (Br/W – B)
CDI unit:		
Stamped mark		62T-00
Model/Manufacturer		F-6192X/MITSUBISHI
Over revolution limit	r/min	7,000 ~ 7,400
Overheat revolution control	r/min	3,000 ~ 3,800
Ignition coil:		
Stamped mark		62E-00
Model/Manufacturer		F6T532/MITSUBISHI
Primary winding resistance	Ω	0.078 ~ 0.106 (O – B)
Secondary winding resistance	kΩ	3.5 ~ 4.7 (high tension cords)
Charging system:		
Type		Flywheel magneto
Lighting coil resistance (color)	Ω	1.14 ~ 1.40 (G – G)
Rectifier regulator:		
Model/Manufacturer		SH589-12/SHINDENGEN
Regulate voltage	V	14.3 ~ 15.3
Thermo sensor:		
ON	°C (°F)	76 ~ 84 (169 ~ 183)
OFF	°C (°F)	63 ~ 77 (145 ~ 171)
Starter motor:		
Model/Manufacturer		SM13237/MITSUBA
Brush length limit	mm (in)	6.5 (0.26)
Commutator undercut limit	mm (in)	0.2 (0.01)
diameter limit	mm (in)	27 (1.06)
Fuse:		
Rating	A	10


**TIGHTENING TORQUE
SPECIFIED TORQUE**

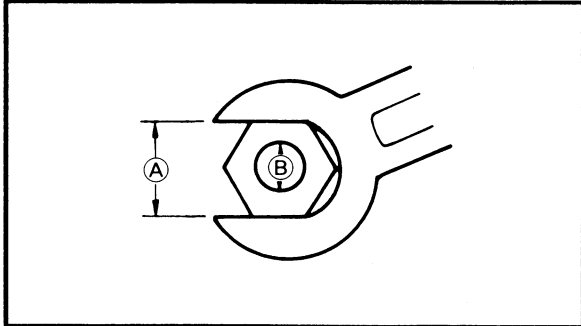
Part to tightened	Part name	Size	Q'ty	Tightening torque			Remarks	
				Nm	m•kg	ft•lb		
ENGINE:								
Electric box	Bolt	M8	2	13	1.3	9.4		
Mounting bolt	Bolt	M8	4	17	1.7	12		
Reed valve	Screw	M4	16	1	0.1	0.7		
Muffler stay	1st	Bolt	M10	5	4	0.4	2.9	
	2nd				40	4.0	29	
Muffler 2- Muffler stay	1st	Bolt	M10	3	28	2.8	20	
	2nd				53	5.3	38	
Muffler 1	1st	Bolt	M10	8	15	1.5	11	
	2nd				30	3.0	22	
Cylinder body	1st	Bolt	M10	6	23	2.3	17	
	2nd				40	4.0	29	
Cylinder head	1st	Bolt	M8	10	15	1.5	11	
	2nd				36	3.6	26	
Spark plug	Bolt	M14	2	20	2.0	14		
Flywheel bolt	Bolt	M10	1	70	7.0	51		
Crankcase	1st	Bolt	M8	8	15	1.5	11	
	2nd				28	2.8	20	
Mount bracket	1st	Bolt	M10	7	23	2.3	17	
	2nd				47	4.7	34	
Coupling	Nut	M27	1	37	3.7	27		
Frame arrestor cover	Bolt	M6	6	2	0.2	1.4		
Starter motor terminal nut	Nut	M6	1	5	0.5	3.6		
JET UNIT:								
Mounting bolt	Bolt	M10	4	17	1.7	12		
Ride plate	Bolt	M8	4	17	1.7	12		
Impeller (left-hand threads)	Bolt	M20	1	18	1.8	13		
Coupling	Nut	M27	1	37	3.7	27		
Intermediate housing	Bolt	M8	3	17	1.7	12		



Nut (A)	Bolt (B)	General torque specifications		
		Nm	m•kg	ft•lb
8 mm	M5	5.0	0.5	3.6
10 mm	M6	8.0	0.8	5.8
12 mm	M8	18	1.8	13
14 mm	M10	36	3.6	25
17 mm	M12	43	4.3	31

GENERAL TORQUE

This chart specifies the torques for tightening standard fasteners with standard clean dry ISO threads at room temperature. Torque specifications for special components or assemblies are given in applicable sections of this manual. To avoid causing warpage, tighten multifastener assemblies in a criss-cross fashion, in progressive stages until the specified torque is reached.



CHAPTER 3

PERIODIC INSPECTION AND ADJUSTMENT

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MAINTENANCE INTERVAL CHART

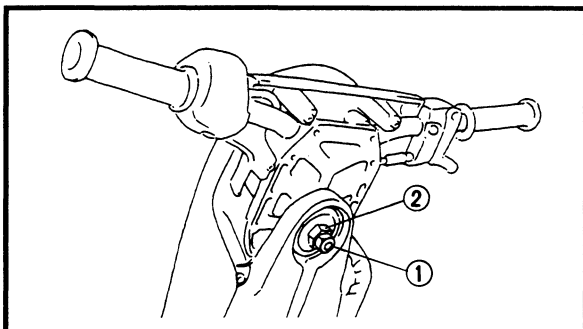
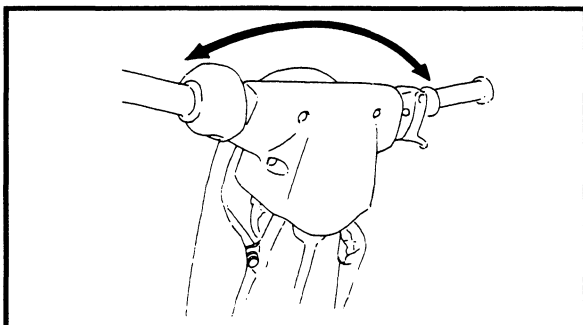
The following chart should be considered strictly as a guide to general maintenance intervals.

Depending on operating conditions, the intervals of maintenance should be changed.

Item	Initial		Every		Refer to page
	10 hours (Break-in)	50 hours (3 months)	100 hours (6 months)	200 hours (1 year)	
CONTROL SYSTEM:					
Steering cable			○		3-3
Throttle cable			○		3-4
Carburetor throttle shaft			○		—
Choke cable			○		3-5
Steering pivot	○		○		3-2
Steering friction	○		○		3-2
FUEL SYSTEM:					
Fuel tank				○	4-7
Fuel filter	○			○	3-6
Fuel line			○		4-1
Trolling speed			○		3-6
Carburetor setting	○		○		3-7
POWER UNIT:					
Spark plug	○	○	○		3-8
Cooling-water passage		○			—
Coupling rubber				○	—
ELECTRICAL:					
Battery	○				3-9
JET PUMP UNIT:					
Impeller		○	○		3-11
Bilge strainer		○	○		3-12
GENERAL:					
Bolt and nut	○		○		—
Greasing point			○		3-12
Bearing housing	○ *1		○ *2		3-12

*1: Grease capacity 20.0 ~ 22.0 cm³ (0.68 ~ 0.74 oz.)

*2: Grease capacity 3.0 ~ 5.0 cm³ (0.10 ~ 0.17 oz.)



PERIODIC SERVICE
CONTROL SYSTEM

Steering friction inspection and adjustment

1. Check:

- Pivot shaft bearing
Turn the handlebar lock to lock.
Rough action → Adjust.
Excessive play → Replace bearings.
Refer to "HANDLE COLUMN" in chapter 8.

2. Adjust:

- Bearing friction

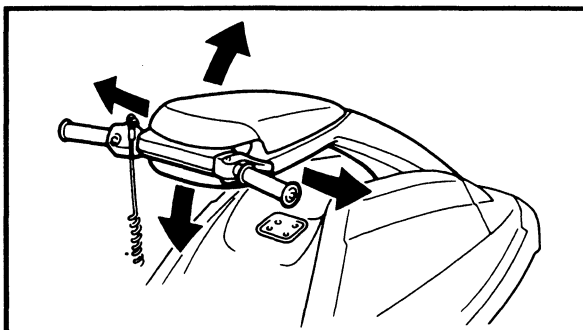
Adjustment steps:

- Remove the handle lower cover.
- Loosen the lock nut ①.
- Turn the adjusting nut ② until the desired amount of friction is reached.
- Tighten the lock nut while holding the adjusting nut.



Lock nut:
29 Nm (2.9 m · kg, 21 ft · lb)

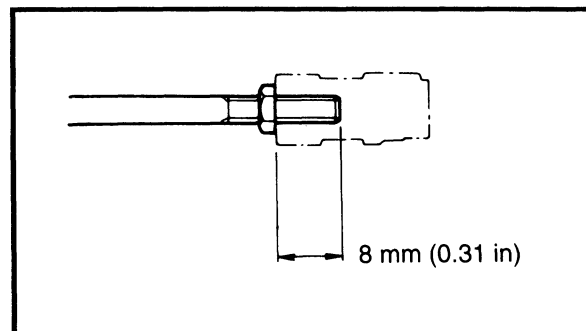
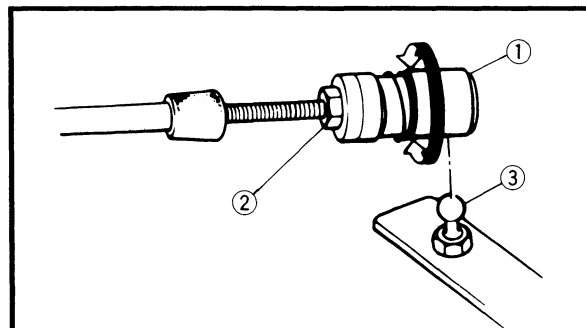
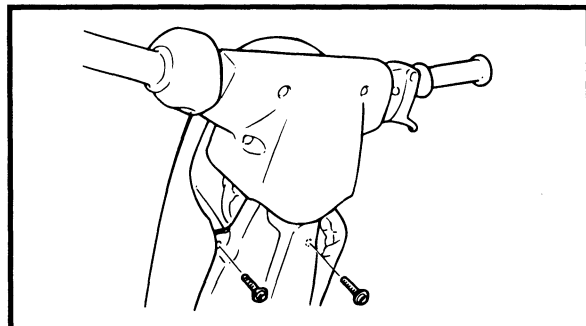
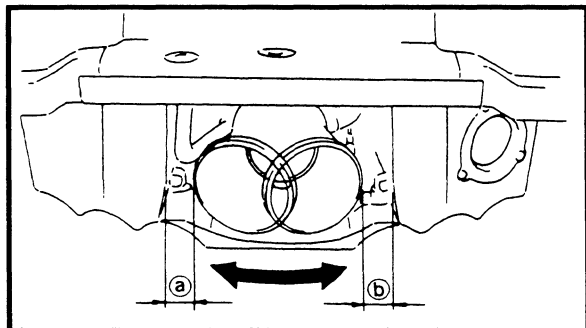
- Install the handle lower cover.



Steering pole pivot shaft bushing inspection

1. Check:

- Steering pole pivot shaft bushing
Excessive play → Replace bearings.
Refer to "STEERING POLE" in chapter 8.



Steering cable inspection and adjustment

1. Check:

- Jet nozzle clearance (a), (b)
Incorrect → Adjust.

Checking steps:

- Turn the handlebar lock to lock.
- Measure the clearances (a) and (b).
- If the (a) and (b) clearances are not even, adjust the clearances.

2. Adjust:

- Cable joint (handle side) ①

Adjustment steps:

- Remove the steering pad.
- Loosen the lock nut ②.
- Disconnect the cable joint from the ball joint ③.
- Turn the cable joint to adjust.

Turn in	Clearance (a) is increased.
Turn out	Clearance (b) is increased.

⚠ WARNING

The cable joint must be screwed in more than 8 mm (0.31 in).

- Connect the cable joint and tighten the lock nut.

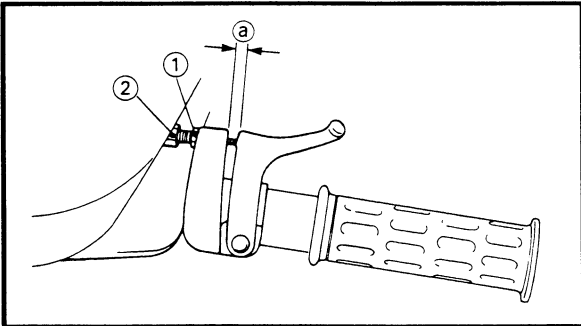


Lock nut:
3 Nm (0.3 m · kg, 2.2 ft · lb)

- Install the steering pad.

NOTE:

If correct adjustment cannot be obtained using the cable joint at the handlebar end adjust the cable joint at the steering nozzle end.



Throttle cable inspection and adjustment

NOTE: _____
Before adjusting the throttle lever free play, the trolling speed should be adjusted.

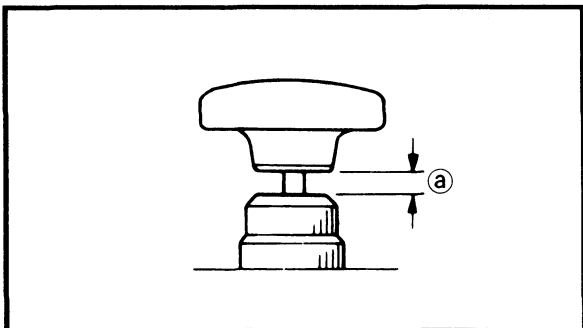
1. Measure:
- Throttle lever free play (a)
Out of specification → Adjust.

	Throttle lever free play: 7 ~ 10 mm (0.28 ~ 0.39 in)
--	--

2. Adjust:
- Throttle lever free play

Adjustment steps:	
● Loosen the lock nut (1).	
● Turn the adjuster (2) in/out until the specified free play is obtained.	
Turn in	Free play is increased.
Turn out	Free play is decreased.
● Tighten the lock nut.	

⚠ WARNING _____
After adjusting the free play, turn the handlebar to right and left, and make sure that the trolling speed does not increase.

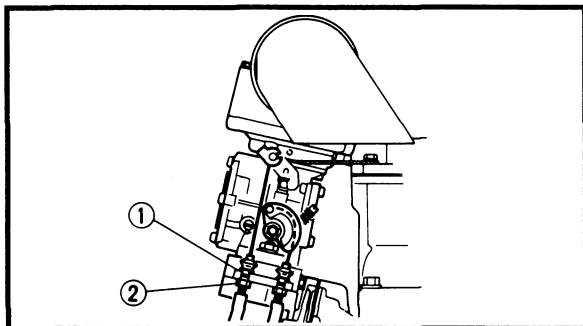


Choke cable inspection and adjustment

1. Measure:

- Choke cable free play ①
- Out of specification → Adjust.

	<p>Choke cable free play: 1 ~ 6 mm (0.04 ~ 0.24 in)</p>
--	--



2. Adjust:

- Choke cable free play

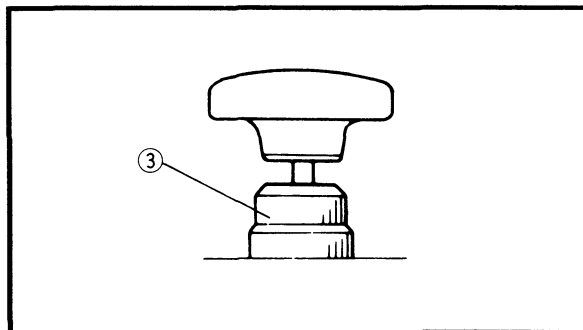
Adjustment steps:

- Loosen the lock nut ①.
- Turn the adjuster ② in/out until the specified free play is obtained.

Turn in	Free play is increased.
Turn out	Free play is decreased.

- Tighten the lock nut.

	<p>Lock nut: 8 Nm (0.8 m · kg, 5.8 ft · lb)</p>
--	--



3. Inspect:

- Pull knob farthest toward
- Knob automatically returns → Adjust.

4. Adjust:

- Adjust nut ③
- Turn in to stop automatic return.



FUEL SYSTEM

⚠ WARNING

- Stop the engine, set the fuel cock to "OFF" and loosen the fuel filler cap before a fuel system service.
- When removing fuel system parts, hold them in a cloth and take care that no fuel spills into the engine compartment.

Fuel filter inspection

1. Inspect:
 - Filter element
Contamination → Replace.
 - Filter body
Crack/Damage → Replace.
 - Filter assembly
Water contamination → Replace and check the fuel tank.

Trolling speed inspection and adjustment

1. Check:
 - Trolling speed
Out of specification → Adjust.

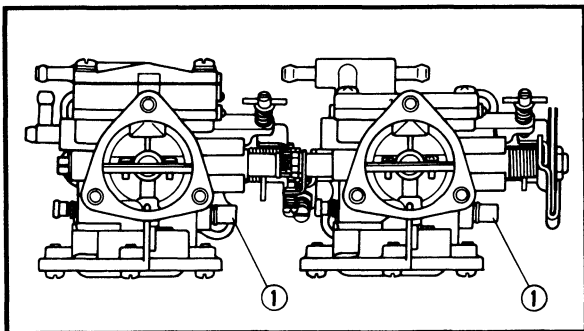
	Trolling speed: 1,300 ± 50 r/min
--	---

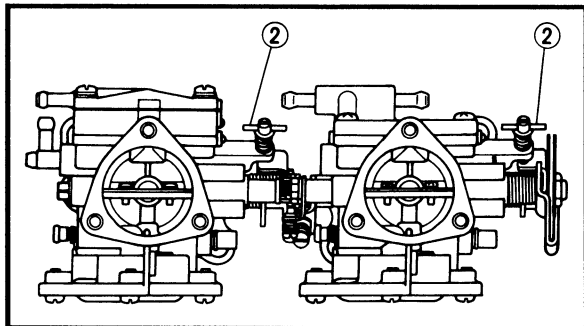
Checking steps: (vehicle on water)
<ul style="list-style-type: none"> ● Start the engine and allow it to warm up for a few minutes. ● Attach the engine tachometer to the spark plug lead.

	Engine tachometer: YU-8036-A/90890-06760
<ul style="list-style-type: none"> ● Measure the engine trolling speed. 	

2. Adjust:
 - Trolling speed

Adjustment steps:
<ul style="list-style-type: none"> ● Screw in the low speed screws ① until they are lightly seated. ● Back the screws out by the specified number of turns.

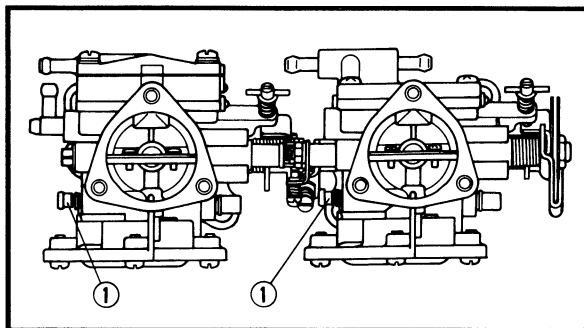




Low speed screw:
7/8 ± 1/4 (turns out)

- Start the engine and allow it to warm up for a few minutes.
- Turn the throttle stop screws ② in or out until the specified speed is obtained.

Turning in	Increase trolling speed.
Turning out	Decrease trolling speed.



Carburetor adjustment

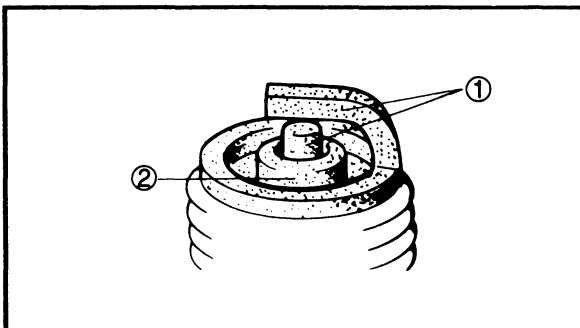
1. Adjust:
 - High speed screw

Adjustment steps:

- Screw in the high speed screws ① until they are lightly seated.
- Back the screws out by the specified number of turns.



High speed screw:
1-1/8 (F), 1-1/2 (R) ± 1/4 (turns out)



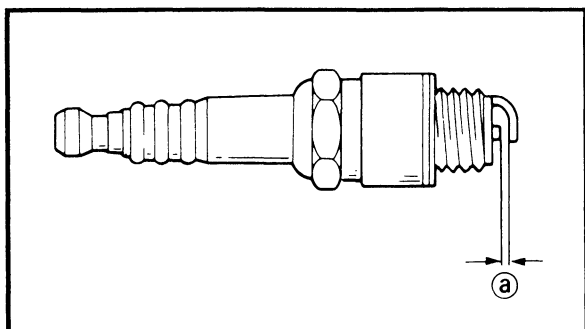
POWER UNIT

Spark plug inspection

1. Inspect:
 - Electrode ①
Wear/Damage → Replace.
 - Insulator color ②
Discolor → Check the engine condition.



Color guide:
Medium to light tan color:
 Normal
Whitish color:
 Lean fuel mixture
 Plugged fuel mixture
 Air leak
 Incorrect settings
Blackish color:
 Overly rich mixture
 Electrical malfunction
 Excess oil used
 Defective spark plug



2. Clean:
 - Spark plug
Clean the spark plug with a spark plug cleaner or wire brush.
3. Measure:
 - Spark plug gap ②
Out of specification → Alter gap.
Use a wire gauge.

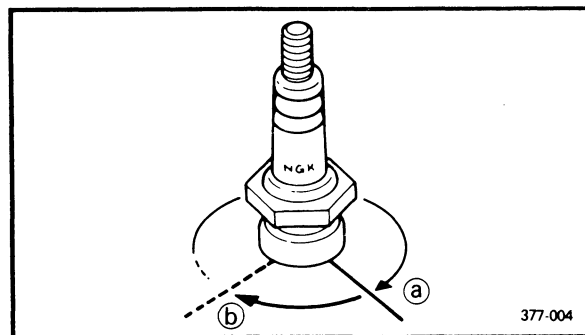


Spark plug gap:
 0.6 ~ 0.7 mm (0.024 ~ 0.028 in)

4. Tighten:
 - Spark plug



Spark plug:
 20 Nm (2.0 m · kg, 14 ft · lb)



NOTE:

- Before installing a spark plug, clean the gasket surface and plug surface. Also it is advisable to apply a thin film of Anti Seize Compound to the spark plug threads to prevent future thread seizure.
- If a torque wrench is not available, a good estimate of the correct torque for the spark plug is a further 1/4 to 1/2 turns ② on from finger tightness ②.

ELECTRICAL
Battery inspection**CAUTION:**

Be careful not to place the battery on its side. Before adding the battery fluid or recharging, be sure to remove it from the engine compartment. When checking the battery, make sure the breather hose is connected to the battery and is not pinched shut anywhere in the engine compartment.

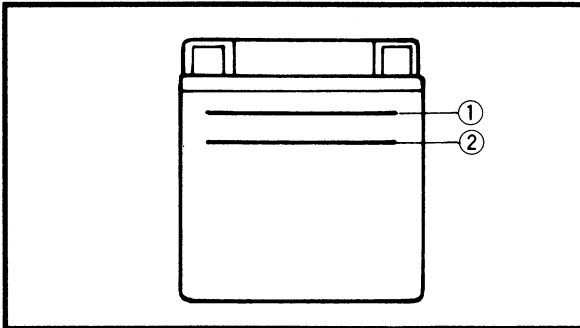
⚠ WARNING

- Battery electrolyte is poisonous and dangerous, causing severe burns, etc. Contains sulfuric acid.
- Avoid contact with skin, eyes or clothing.
- Antidote: EXTERNAL-Flush with water.
- INTERNAL-Drink large quantities of water or milk. Follow with milk of magnesia, beaten egg or vegetable oil. Call a physician immediately.
- Eyes: Flush with water for 15 minutes and get prompt medical attention. Batteries produce explosive gases.
- Keep sparks, flame, cigarettes, etc., away. Ventilate when charging or using in an enclosed space. Always shield your eyes when working near batteries.
- KEEP OUT OF REACH OF CHILDREN.

1. Remove:
 - Battery

⚠ WARNING

- When removing the battery, disconnect the negative lead first.
- Remove the battery to prevent acid loss during the impeller service.



2. Inspect:
 - Battery fluid level
Battery fluid level low → Top up with distilled water.
Fluid level should be between upper ① and lower ② level marks.


Filling steps:

- Remove each filler cap using pliers.
- Fill with distilled water using a jug.
- When the acid is up to the UPPER LEVEL, allow the cell to stand for 20 minutes. If the acid level has dropped, add more acid up to the UPPER LEVEL once again.

CAUTION

Water other than distilled water contains minerals which are harmful to a battery; top up only with distilled water.

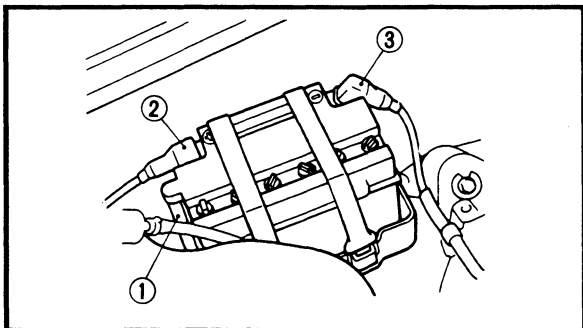
3. Inspect:
 - Battery fluid specific gravity
Out of specification → Charge.

	Specific gravity at 20°C (68°F):
	1.28
	Charging current:
	68.4 kC (1.9 Amps × 10 Hrs)

4. Install:
 - Filler cap

CAUTION

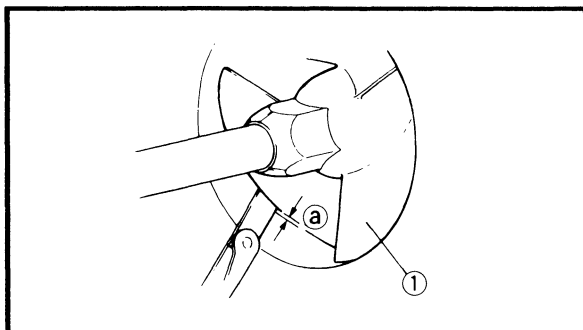
Rinse off any acid from the battery case and wipe the battery dry prior to installation.



5. Install:
- Breather hose ①
 - Battery
 - Positive lead ②
 - Negative lead ③
 - Battery band

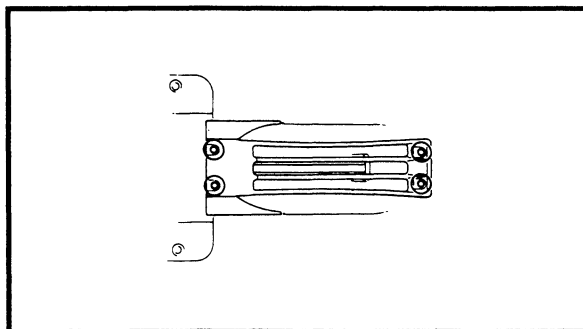
CAUTION:


- Connect the positive red lead ⊕ to the battery terminal first.
- Make sure the battery leads are connected properly. Reversing the leads can seriously damage the electrical system.
- Make sure the breather hose is properly connected and is not obstructed.
- Coat the terminals with a water resistant grease to minimize terminal corrosion.



JET PUMP UNIT
Impeller inspection


1. Check:
- Impeller ①
Wear/Damage → Replace.
Scratch/Nick → File/Grind.
2. Measure:
- Impeller clearance ②
Out of specification → Replace.



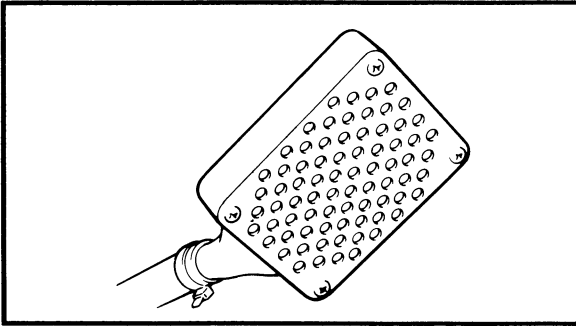
 **Impeller clearance limit:**
0.6 mm (0.024 in)

Measurement steps:

- Remove the battery.
- Remove the intake screen.
- Measure the clearance at all four points.
- Install the intake screen.

 **Bolt:**
5 Nm (0.5 m · kg, 3.6 ft · lb)

- Install the battery.



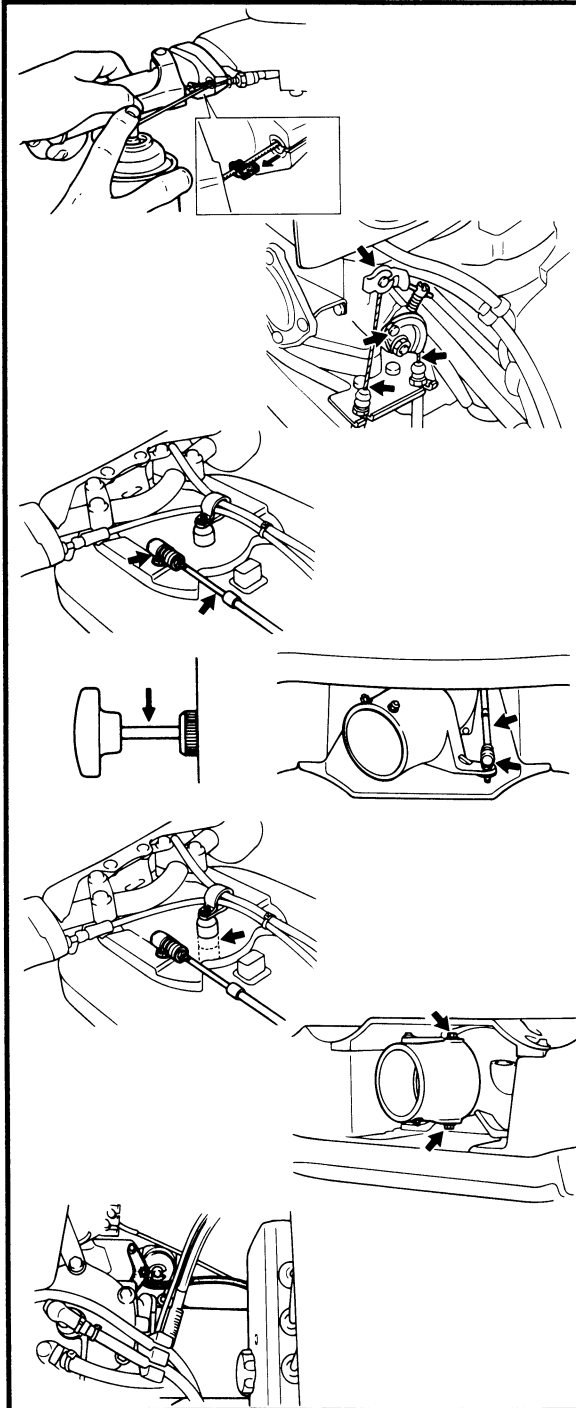
Bilge strainer inspection

1. Inspect:

- Strainer
Contamination → Clean.
Crack/Damage → Replace.

Inspection steps:

- Remove the coupling cover.
- Disconnect the bilge strainer from the strainer holder.
- Inspect the bilge strainer.



GENERAL

Greasing point

1. Apply:

- Throttle cable inner wire

NOTE:

Squeeze the throttle lever and remove the seal. Spray a rust-inhibitor into the outer cable.



**Recommended fluid:
Rust-inhibitor**

- Throttle cable inner wire
- Choke cable inner wire
- Cable joint
- Steering cable

NOTE:

Remove the cable joint and apply a small amount of grease to the following parts.

- Steering pivot shaft bearing
- Choke knob shaft
- Bearing housing



**Recommended grease:
Water resistant grease**

NOTE:

- Fill in the bearing housing with water resistant grease from a nipple.
- Fill the grease slowly and carefully, as it can damage the hose and the joints.
- Refer to the "MAINTENANCE INTERVAL CHART".

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