



TROUBLESHOOTING

WHEN MAIN SWITCH IS TURNED TO "ON", EX-UP SERVO MOTOR DOES NOT OPERATE.

Procedure (1)

Check:

- EX-UP servomotor operation (with EX-UP servomotor coupler connected)
- Voltage
- EX-UP servomotor operation (with EX-UP servomotor coupler disconnected)
- EX-UP servomotor resistance (potentiometer resistance)
- Wiring connection (entire EX-UP system)

Procedure (2)

Check:

- Fuse (main and ignition)
- Battery
- Main switch
- "ENGINE STOP" switch
- Wiring connection (entire EX-UP system)

NOTE:

- Remove the following parts before troubleshooting.
 - Seat
 - Tail cover
- Use the following special tool in this troubleshooting.

Pocket tester:
90890-03112

Procedure (1)

- EX-UP servomotor operation (with EX-UP servomotor coupler connected)
- Disconnect the EX-UP cables at EX-UP servomotor pulley side
 - Start the engine and rev it at 2,000-r/min

PULLEY TURNS

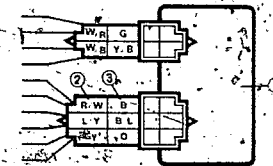
Check the EX-UP cables connection. If connection is correct, inspect the EX-UP valve and cables.
Refer to the "ENGINE OVERHAUL" section in the CHAPTER 4

PULLEY DOES NOT TURN

2 Voltage

- Connect the pocket tester (DC20V) to the digital ignitor unit ① connector.

Tester (+) lead - Red/White ② terminal.
Tester (-) lead - Black ③ terminal.



OUT OF SPECIFICATION

- Turn the main switch to "ON", and check for the voltage between "Red/White and Black".

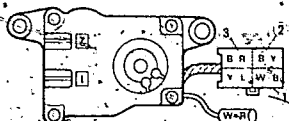
Voltage (Red/White - Black)
≈ 10-14V

MEETS SPECIFICATION

3 EX-UP servomotor operation (with EX-UP servomotor coupler disconnected)

- Disconnect the EX-UP cables from the EX-UP servomotor pulley.
- Disconnect the EX-UP servomotor coupler from the wireharness.
- Connect the battery leads to the EX-UP motor coupler.

Battery positive lead - Black/Yellow 2 lead
Battery negative lead - Black/Red 3 lead



PULLEY DOES NOT TURN

Replace EX-UP servomotor



- Check the EX-UP servomotor for pulley operation by allowing it to rotate several times.

CAUTION:

This test should be performed within a few seconds to prevent further damage.

PULLEY TURNS

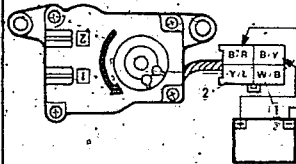
- 4 EX-UP servomotor resistance (potential resistance)

- Disconnect the EX-UP servomotor coupler from the wireharness.

Step 1:

- Connect the pocket tester ($\Omega \times 1K$) to the EX-UP servomotor couplers.

Tester (+) lead—White/Black ① lead
Tester (–) lead—Yellow/Blue ② lead



- Measure the EX-UP servomotor resistance.

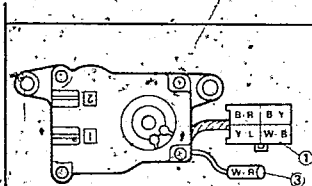


EX-UP servomotor resistance:
6.7–10 k Ω
(White/Black—Yellow/Blue)

Step 2:

- Connect the pocket tester ($\Omega \times 1K$) to the EX-UP servomotor coupler.

Tester (+) lead—White/Black ① lead
Tester (–) lead—White/Red ③ lead



- Measure the EX-UP servomotor resistance while turning the pulley slowly.



EX-UP servomotor resistance:
0—about 10 k Ω
(White/Black—White/Red)
When pulley is turned once.

BOTH MEET SPECIFICATIONS

- 5. Wiring connection

- Check the entire EX-UP system for connections. Refer to the "WIRING DIAGRAM" section.

CORRECT

Replace digital ignitor unit.

OUT OF SPECIFICATION

EX-UP servomotor is faulty; replace it.

POOR CONNECTION

Correct



Procedure (2)

1. Fuse (main and ignition)

- Remove the fuse.
- Connect the pocket tester ($\Omega \times 1$) to the fuses.
- Check the fuses for continuity.

CONTINUITY

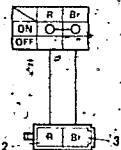
2. Battery

- Check the battery condition. Refer to the "BATTERY INSPECTION" section in the CHAPTER 3.

CORRECT

3. Main switch

- Disconnect the main switch coupler (1) and lead from the wireharness.
- Check the switch component for the continuity between "Red (2) and Brown (3)". Refer to the "CHECKING OF SWITCHES" section.



CORRECT

NOCONTINUITY

Replace fuse(s)

INCORRECT

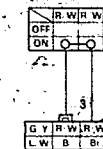
- Clean battery terminals.
- Recharge or replace battery.

INCORRECT

Replace main switch

4 "ENGINE STOP" switch

- Disconnect the handlebar switch (right) coupler (1) from the wireharness.
- Check the switch component for the continuity between "Red/White (2) and Red/White (3)". Refer to the "CHECKING OF SWITCHES" section.



CORRECT

INCORRECT

Replace handlebar switch (right)

5. Wiring connection

- Check the entire EXUP system for connections. Refer to the "WIRING DIAGRAM" section.

CORRECT

POOR CONNECTION

Correct

Refer to "procedure (1)".

?

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CHAPTER 9
TROUBLESHOOTING

STARTING FAILURE/HEAD STARTING	A-7
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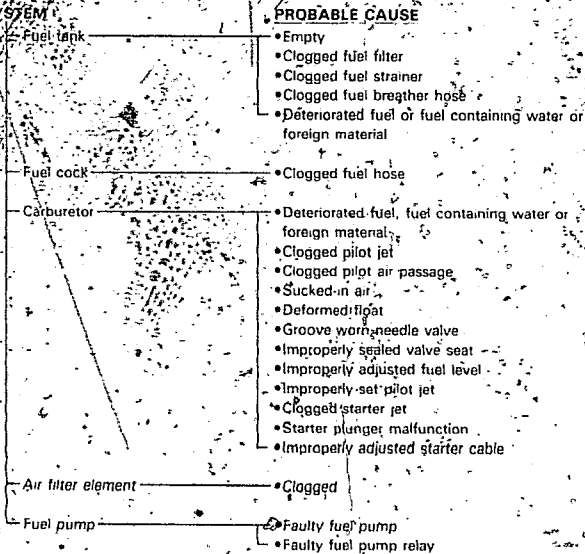
TROUBLESHOOTING

NOTE

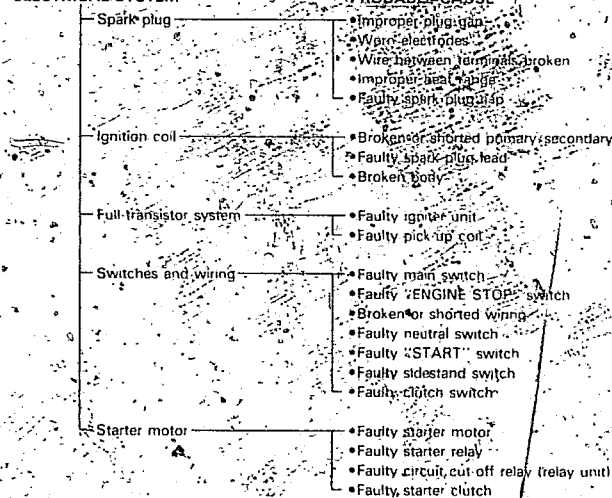
The following troubleshooting does not cover all the possible causes of trouble. It should be helpful, however, as a guide to troubleshooting. Refer to the relative procedure in this manual for inspection, adjustment, and replacement of parts.

STARTING FAILURE/HARD STARTING

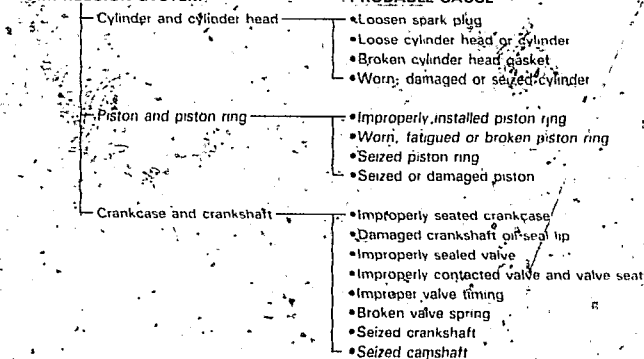
FUEL SYSTEM



ELECTRICAL SYSTEM



COMPRESSION SYSTEM



**POOR IDLE SPEED PERFORMANCE/
POOR MEDIUM AND HIGH SPEED PERFORMANCE**

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POOR IDLE SPEED PERFORMANCE

POOR IDLE SPEED PERFORMANCE

PROBABLE CAUSE

- Carburetor
 - Improperly returned starter plunger
 - Loose pilot jet
 - Clogged pilot air jet
 - Improperly synchronized carburetors
 - Improperly adjusted idle speed (Throttle stop screw)
 - Improper throttle cable play
 - Flooded carburetor
- Electrical system
 - Faulty battery
 - Faulty spark plug
 - Faulty igniter unit
 - Faulty pickup coil
 - Faulty ignition coil
- Valve train
 - Improperly adjusted valve clearance

POOR MEDIUM AND HIGH SPEED PERFORMANCE

POOR MEDIUM AND HIGH SPEED PERFORMANCE

Refer to "Starting failure/Hard starting" (FUEL SYSTEM, ELECTRICAL SYSTEM, COMPRESSION SYSTEM and valve train)

PROBABLE CAUSE

- Carburetor
 - Improper jet needle clip position
 - Diaphragm malfunction
 - Improperly adjusted fuel level
 - Clogged or loose main jet
- Air cleaner
 - Clogged air filter element
- Fuel pump
 - Faulty fuel pump

**FAULTY GEAR SHIFTING/
CLUTCH SLIPPING/Dragging**

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FAULTY GEAR SHIFTING

HARD SHIFTING

Refer to "CLUTCH DRAGGING"

SHIFT PEDAL DOES NOT MOVE

- Shift shaft
 - Improperly adjusted shift rod
 - Bent shift shaft
- Shift cam, shift fork
 - Groove jammed with impurities
 - Seized shift fork
 - Bent shift fork guide bar
- Transmission
 - Seized transmission gear
 - Jammed impurities
 - Incorrectly assembled transmission

JUMP-OUT GEAR

PROBABLE CAUSE

- Shift shaft
 - Improperly adjusted shift lever position
 - Improperly returned stopper lever
- Shift fork
 - Worn shift fork
- Shift cam
 - Improper thrust play
 - Worn shift cam groove
- Transmission
 - Worn gear dog

CLUTCH SLIPPING/Dragging

CLUTCH SLIPPING

PROBABLE CAUSE

- Clutch
 - Loose clutch spring
 - Fatigued clutch spring
 - Worn friction plate
 - Worn clutch plate
 - Incorrectly assembled clutch
- Engine oil
 - Low oil level
 - Improper quality (Low viscosity)
 - Deterioration

OVERHEATING OR OVER-COOLING

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CLUTCH DRAGGING

Clutch

PROBABLE CAUSE

- Warped pressure plate
- Unevenly tensioned clutch springs
- Match marks not aligned
- Bent push rod
- Loose push rod/bent clutch boss nut
- Burnt primary driven gear bushing
- Bent clutch plate
- Swollen friction plate
- Faulty cylinder kit cup
- Broken clutch boss

Transmission oil

- High oil level
- Improper quality (High viscosity)
- Deterioration

OVERHEATING OR OVER-COOLING

OVERHEATING

Ignition system

PROBABLE CAUSE

- Improper spark plug gap
- Improper spark plug heat range
- Faulty ignitor unit

Fuel system

- Improper carburetor main jet (improper setting)
- Improperly adjusted fuel level
- Clogged air filter element

Compression system

- Heavy carbon build-up

Engine oil

- Incorrect oil level
- Improper oil viscosity
- Inferior oil quality

Brake

- Dragging brake

Cooling system

- Faulty water temperature gauge
- Faulty thermo unit
- Incorrect coolant level
- Faulty thermostat
- Faulty thermo switch
- Clogged or damaged radiator
- Faulty radiator cap
- Seized impeller shaft
- Inoperative fan motor

FAULTY BRAKE/FRONT FORK OIL LEAKAGE AND FRONT FORK MALFUNCTION

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OVER-COOLING

Cooling system

PROBABLE CAUSE

- Faulty water temperature gauge
- Faulty thermo unit
- Faulty thermostat
- Faulty thermo switch
- Inoperative fan motor

FAULTY BRAKE

POOR BRAKING EFFECT

Disc brake

PROBABLE CAUSE

- Worn brake pad
- Worn brake disc
- Air in brake fluid
- Leaking brake fluid
- Faulty cylinder kit cup
- Faulty caliper kit seal
- Loose union bolt
- Broken brake hose
- Oily or greasy brake disc
- Oily or greasy brake pad
- Improper brake fluid level

FRONT FORK OIL LEAKAGE AND FRONT FORK MALFUNCTION

OIL LEAKAGE

PROBABLE CAUSE

- Bent, damaged or rusty inner tube
- Damaged or cracked outer tube
- Damaged oil seal lip
- Improperly installed oil seal
- Improper oil level (too much)
- Loose damper rod holding bolt
- Broken cap bolt O-ring
- Loose drain bolt
- Damaged drain bolt gasket

MALFUNCTION

PROBABLE CAUSE

- Bent, deformed or damaged inner tube
- Bent or deformed outer tube
- Damaged fork spring
- Worn or damaged slide metal
- Bent or damaged damper rod
- Improper oil viscosity
- Improper oil level

INSTABLE HANDLING

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FAULTY SIGNAL AND LIGHTING SYSTEM

TRBL SHTG ?

INSTABLE HANDLING

INSTABLE HANDLING

Handlebars

PROBABLE CAUSE

- Improperly installed or bent

Steering

- Improperly installed handlebar boss and upper bracket
- Bent steering stem
- Improperly installed steering stem (Improperly tightened ringnut)
- Damaged bearing or bearing race

Front forks

- Uneven oil levels on both sides
- Uneven spring tension (Uneven damping adjuster position)
- Broken spring
- Twisted front forks

Tires

- Uneven tire pressures on both sides
- Incorrect tire pressure
- Unevenly worn tires

Wheels

- Incorrect wheel balance
- Deformed cast wheel
- Loose bearing
- Bent or loose wheel axle
- Excessive wheel run out

Frame

- Twisted
- Damaged head pipe
- Improperly installed bearing race

Swingarm

- Worn bearing or bush
- Bent or damaged

Rear shock absorber

- Fatigued spring
- Improperly adjusted spring preload
- Oil and gas leakage

Drive chain

- Improperly adjusted chain slack

Fairing

- Damaged or broken
- Incorrectly installed

FAULTY SIGNAL AND LIGHTING SYSTEM

HEADLIGHT DARK

PROBABLE CAUSE

- Improper bulb
- Too many electric accessories
- Hard charging (Broken stator coil and/or faulty rectifier/regulator)
- Incorrect connection
- Improperly grounded
- Poor contacts (main or "LIGHTS" switch)
- Bulb life expired

BULB BURNT OUT

PROBABLE CAUSE

- Improper bulb
- Faulty battery
- Faulty rectifier/regulator
- Improperly grounded
- Faulty main and/or "LIGHTS" switch
- Bulb life expired

FLASHER DOES NOT LIGHT

PROBABLE CAUSE

- Improperly grounded
- Discharged battery
- Faulty "TURN" switch
- Faulty flasher relay
- Broken wire/harness
- Loosely connected coupler
- Bulb burnt out

FLASHER KEEPS ON

PROBABLE CAUSE

- Faulty flasher relay
- Insufficient battery capacity (nearly discharged)
- Bulb burnt out

FLASHER WINKS SLOWER

PROBABLE CAUSE

- Faulty flasher relay
- Insufficient battery capacity (nearly discharged)
- Improper bulb
- Faulty main and/or "TURN" switch

FLASHER WINKS QUICKER

PROBABLE CAUSE

- Improper bulb
- Faulty flasher relay

HORN IS INOPERATIVE

PROBABLE CAUSE

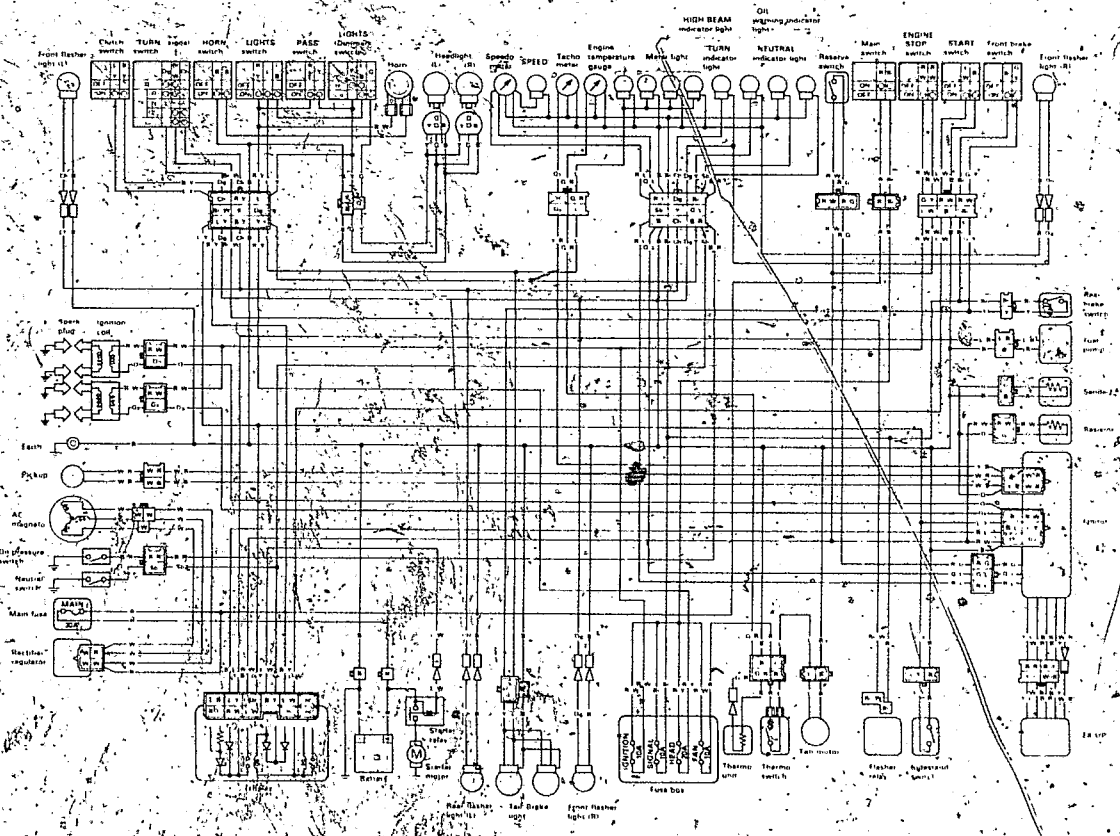
- Faulty battery
- Faulty main and/or horn switch
- Improperly adjusted horn
- Faulty horn
- Broken wire harness

FAULTY EX-UP

FAULTY EX-UP

PROBABLE CAUSE

- Power valve
 - Seized or damaged power valve
 - Carbon build-up
- Control cable
 - Improperly adjusted cable
 - Seized or discontinuous cable
- Electrical parts
 - Insufficient battery capacity (Improperly charged battery)
 - Faulty main switch
 - Faulty EX-UP servomotor
 - Faulty ignitor unit
 - Faulty relay unit
 - Broken or shorted wiring



COLOR CODE

B	Black
R	Red
L	Blue
G	Green
O	Orange
Y	Yellow
P	Pink
Br	Brown
Ch	Chocolate
Gv	Gray
Sh	Sky blue
Dg	Dark green
W	White
B-Y	Black-Yellow
R-W	Red-White
L-Y	Blue-Yellow
L-W	Blue-White
G-R	Green-Red
Gr-W	Brown-White
B-W	Black-White
B-R	Black-Red
Y-L	Yellow-Blue
Y-B	Yellow-Black
B-L	Black-Blue
G-L	Green-Blue
L-B	Blue-Black
R-G	Red-Green
R-L	Red-Blue
R-Y	Red-Yellow
W-B	White-Black
W-R	White-Red

YAMAHA

FZR400RR '92

3TJ-AE1

**SUPPLEMENTARY
SERVICE MANUAL**

FOREWORD

This Supplementary Service Manual has been prepared to introduce new service and data for the FZR400RR ('92). For complete information on service procedures, it is necessary to use this Supplementary Service Manual together with following manual.

FZR400SP Service Manual: 3TJ-ME1

NOTICE

This manual was written by the Yamaha Motor Company primarily for use by Yamaha dealers and their qualified mechanics. It is not possible to put an entire mechanic's education into one manual, so it is assumed that persons using this book to perform maintenance and repairs on Yamaha motor cycles have a basic understanding of the mechanical concepts and procedures inherent in motorcycle repair technology. Without such knowledge, attempted repairs or service to this model may render it unfit to use and/or unsafe.

Yamaha Motor Company, Ltd. is continually striving to improve all models manufactured by Yamaha. Modifications and significant changes in specifications or procedures will be forwarded to all Authorized Yamaha dealers and will, where applicable, appear in future editions of this manual.

PARTICULARLY IMPORTANT INFORMATION

This material is distinguished by the following notation:



The Safety Alert Symbol means ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!



Failure to follow WARNING instructions could result in severe injury or death to the motorcycle operator, a bystander, or a person inspecting or repairing the motorcycle.

CAUTION:

A CAUTION indicates special precautions that must be taken to avoid damage to the motorcycle.

NOTE:

A NOTE provides key information to make procedures easier or clearer.

FZR400RR ('92)
 SUPPLEMENTARY
 SERVICE MANUAL
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 unauthorized use without the written
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HOW TO USE THIS MANUAL

CONSTRUCTION OF THIS MANUAL

This manual consists of chapters for the main categories of subjects. (See "Illustrated symbols.")

- 1st title ①: This is a chapter with its symbol on the upper right of each page.
- 2nd title ②: This title appears on the upper of each page of the left of the chapter symbol. (For the chapter "Periodic inspection and adjustment" the 3rd title appears.)
- 3rd title ③: This is a final title.

MANUAL FORMAT

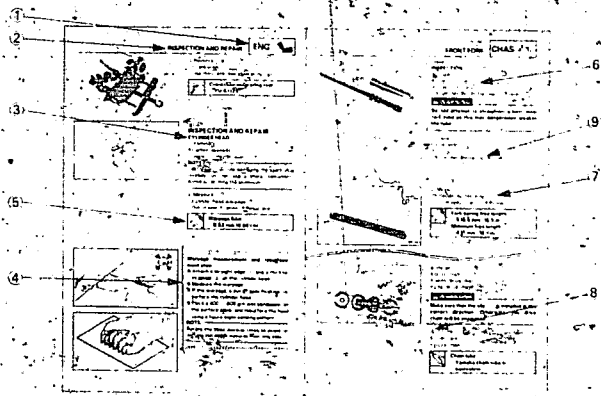
All of the procedures in this manual are organized in a sequential, step-by-step format. The information has been compiled to provide the mechanic with an easy to read, handy reference that contains comprehensive explanations of all disassembly, repair, assembly, and inspections. A set of particularly important procedure ④ is placed between a line of asterisks * * with each procedure preceded by •.

IMPORTANT FEATURES

- Data and a special tool are framed in a box preceded by a relevant symbol ⑤.
- An encircled numeral ⑥ indicates a part name, and an encircled alphabetical letter data or an alignment mark ⑦, the others being indicated by an alphabetical letter in a box ⑧.
- A condition of a faulty component will precede an arrow symbol and the course of action required the symbol ⑨.

EXPLODED DIAGRAM

Each chapter provides exploded diagrams before each disassembly section for ease in identifying correct disassembly and assembly procedures.



① GEN INFO	② SPEC
③ INSP ADJ	④ ENG
⑤ COOL	⑥ CARB
⑦ CHAS	⑧ ELEC
⑨ TRBL SHTG ?	⑩
⑪	⑫
⑬	⑭
⑮	⑯
⑰	⑱
⑲	⑳
㉑	㉒
㉓	㉔

ILLUSTRATED SYMBOLS (Refer to the illustration)

Illustrated symbols ① to ⑨ are designed, as thumb tabs to indicate the chapter's number and content.

- ① General information
- ② Specifications
- ③ Periodic inspection and adjustment
- ④ Engine
- ⑤ Cooling system
- ⑥ Carburetor
- ⑦ Chassis
- ⑧ Electrical
- ⑨ Troubleshooting

Illustrated symbols ⑩ to ⑯ are used to identify the specifications appearing in the text.

- ⑩ Filling fluid
- ⑪ Lubricant
- ⑫ Special tool
- ⑬ Tightening
- ⑭ Wear limit, clearance
- ⑮ Engine speed
- ⑯ Ω, V, A.

Illustrated symbols ⑰ to ㉔ in the exploded diagram indicate grade of lubricant and location of lubrication point.

- ⑰ Apply engine oil
- ⑱ Apply gear oil
- ⑲ Apply molybdenum disulfide oil
- ㉑ Apply wheel bearing grease
- ㉒ Apply lightweight lithium-soap base grease
- ㉓ Apply molybdenum disulfide grease
- ㉔ Apply locking agent (LOCTITE®)

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FZR400RR (For GB/F) WIRING DIAGRAM



GENERAL INFORMATION

MOTORCYCLE IDENTIFICATION

FRAME SERIAL NUMBER

The frame serial number (1) is stamped into the right side of the steering head.

Starting serial number:

4DX-000101 (GB)
4DX-001101 (F)

ENGINE SERIAL NUMBER

The engine serial number (2) is stamped into the right side of the engine.

Starting serial number:

4DX-000101 (GB)
4DX-001101 (F)

NOTE:

- The first three digits of these numbers are for model identifications, the remaining digits are the unit production number.
- Designs and specifications are subject to change without notice.

SPECIFICATIONS

GENERAL SPECIFICATIONS

Model	FZR400RR
Model code number:	4DX1 (GB)/4DX2 (F)
Frame starting number:	4DX 000101 (GB) 4DX-001101 (F)
Engine starting number:	4DX 000101 (GB) 4DX 001101 (F)
Dimensions	
Overall length	2,015 mm (79.3 in) (GB) 1,975 mm (77.8 in) (F)
Overall width	705 mm (27.8 in)
Overall height	1,090 mm (42.9 in)
Seat height	760 mm (29.9 in)
Wheelbase	1,370 mm (53.9 in)
Minimum ground clearance	125 mm (4.9 in)
Coolant total amount: (Including all routes)	1.9 L (1.7 imp qt, 2.0 US qt)
Fuel	
Type	Regular unleaded gasoline
Tank capacity	15 L (3.3 imp gal, 4.0 US gal)
Reserve amount	2.5 L (0.6 imp gal, 0.7 US gal)
Transmission	
Primary reduction system	Spur gear
Primary reduction ratio	88/41 (2.170)
Secondary reduction system	Chain drive
Secondary reduction ratio	55/19 (2.895)
Transmission type	Constant mesh 6-speed
Operation	
Gear ratio	Left foot operation
1st	43/13 (3.308)
2nd	40/18 (2.222)
3rd	36/21 (1.714)
4th	33/23 (1.435)
5th	28/22 (1.273)
6th	27/23 (1.174)

GENERAL SPECIFICATIONS

SPEC

09

B-6

MAINTENANCE SPECIFICATIONS

SPEC

09

Model	FZR400RR	
Tire	Front	Rear
Type	Tubeless	Tubeless
Size	120/60R17 55H	160/60R17 69H
Manufacturer (Type)	DUNLOP (D201F) MICHELIN (TX11) BRIDGESTONE (CY17)	DUNLOP (D201) MICHELIN (TX23) BRIDGESTONE (CY16)
Bulb Wattage x Quantity:		
Headlight	12V 55/40W x 2 (GB) 12V 60/55W x 1 (F)	
Tail/brake light	12V 5W/21W x 2	
Flasher light	12V 21W x 4	
Auxiliary light	12V 4W x 1 (F)	
Indicator light:		
Wattage x Quantity	"METER LIGHT"	12V 1.7W x 4
	"NEUTRAL"	12V 3.4W
	"HIGH BEAM"	12V 3.4W
	"TURN"	12V 3.4W
	"OIL"	12V 3.4W

MAINTENANCE SPECIFICATIONS

ENGINE

Model	FZR400RR
Clutch:	
Friction plate:	
Thickness	2.9 - 3.1 mm (0.114 - 0.122 in)
Quantity	8 pcs
Wear limit	2.8 mm (0.11 in)
Clutch plate:	
Thickness	1.8 - 2.2 mm (0.072 - 0.085 in)
Quantity	7 pcs
Wear limit	1.6 mm (0.063 in)
Clutch spring:	
Free length	33.5 mm (1.32 in)
Quantity	5 pcs
Minimum free length	32.5 mm (1.28 in)
Clutch release method	Inner push, screw push
Carburetor:	
I.D. mark	3TJ-01
Main jet	(M.J.) # 14, # 100, # 23, # 97.5
Main air jet	(M.A.J.) # 65
Jet needle	(J.N.) # 1.4: 5CEW16 3 # 2.3: 5CKP3.3
Needle jet	(N.J.) X-6
Throttle valve size	(Th.V.) # 130
Pilot jet	(P.J.) # 32.5
Pilot air jet	(P.A.J.) # 110
Bypass 1	(B.P.1) ϕ 0.8
2	(B.P.2) ϕ 0.8
3	(B.P.3) ϕ 0.8
Pilot screw	(P.S.) 2 1/2 turns out
Valve seat	(V.S.) ϕ 1.0
Starter jet 1	(S.S.1) # 50
2	(S.S.2) ϕ 0.6
Fuel level	20.9 - 21.9 mm (0.82 - 0.86 in) Above from the float chamber line
Engine idling speed	1,250 - 1,350 r/min
Vacuum pressure at idling speed	19.1 kPa or more (145-mmHg, 5.7 inHg)
Lubrication system:	
Oil filter type	Paper type
Oil pump type	Trochoid pump type
Tip clearance	0.12 mm (0.0047 in)
Side clearance	0.03 - 0.08 mm (0.0012 - 0.0031 in)

MAINTENANCE SPECIFICATIONS

SPEC 99

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Model	FZR400RR
Cooling system:	
Radiator core size	Width: 320 mm (12.6 in) Height: 238 mm (9.37 in) Thickness: 24 mm (0.94 in)
Radiator cap opening pressure	105 - 125 kPa (1.05 - 1.25 kg/cm ² , 14.93 - 17.77 psi)
Reservoir tank capacity <From low to full level>	0.3 L (0.26 imp qt, 0.32 US qt)
Water pump	<0.28 L (0.25 imp qt, 0.30 US qt)>
Type	Single-suction centrifugal pump
Reduction ratio	81/41 x 48/49 (2.126)
Thermostat	
Opening temperature	102 - 108°C (216 - 226°F)


MAINTENANCE SPECIFICATIONS

SPEC 99










TIGHTENING TORQUE

Part to be tightened	Part name	Thread size	Q'ty	Tightening torque			Remarks
				Nm	m.kg	ft.-lb	
Camshaft cap	Flange bolt	M 6	24	10	1.0	7.2	
Cylinder head	Nut	M 9	12	37	3.7	27	
Spark plug	M10	4	12.5	1.25	9.0		
Cylinder head cover	Bolt	M 6	8	10	1.0	7.2	
Cylinder (dram)	Bolt	M 6	2	7	0.7	5.1	
Connecting rod	Nut	M 7	8	23	2.3	17	
Camshaft sprocket	Bolt	M 7	4	24	2.4	17	
Timing chain tensioner	Bolt	M 6	2	10	1.0	7.2	
	Bolt	M11	1	20	2.0	14	
Chain tensioner guide (intake)	Bolt	M 6	2	10	1.0	7.2	
Pipe 2	Bolt	M 6	2	10	1.0	7.2	
Thermo unit cover	Bolt	M 6	2	10	1.0	7.2	
	Flange bolt	M 6	2	7	0.7	5.1	
Radiator	Flange bolt	M 6	4	7	0.7	5.1	
Joint	Bolt	M 6	4	10	1.0	7.2	
Water pump cover	Bolt	M 6	4	10	1.0	7.2	
Pipe 1	Bolt	M 6	2	10	1.0	7.2	
Oil pump cover	Screw	M 6	1	7	0.7	5.1	
Oil pump assembly	Bolt	M 6	3	10	1.0	7.2	
Oil strainer housing	Bolt	M 6	2	10	1.0	7.2	
Oil pan	Bolt	M 6	14	10	1.0	7.2	
Drain bolt		M14	1	43	4.3	31	
Oil delivery pipe	Union bolt	M10	1	20	2.0	14	
	Bolt	M 6	1	10	1.0	7.2	
Oil filter	M20	1	17	1.7	12		
Oil filter housing	Union bolt	M20	1	50	5.0	36	
Bypass valve assembly	M20	1	63	6.3	45		
Carburetor joint	Bolt	M 6	8	10	1.0	7.2	
	Screw	M 5	4	5	0.5	3.6	
Air filter case	Flange bolt	M 6	1	7	0.7	5.1	
Exhaust pipe (CO)	Nut	M 6	8	10	1.0	7.2	
	Bolt	M 6	4	10	1.0	7.2	
Muffler	Bolt	M 8	1	20	2.0	14	
EX-UP	Bolt	M 6	3	10	1.0	7.2	
Pulley	Bolt	M 5	1	5	0.5	3.6	
Exhaust joint	Bolt	M 8	1	20	2.0	14	
Exhaust pipe and muffler	Bolt	M 8	1	20	2.0	14	
EX-UP cover	Bolt	M 5	3	10	1.0	7.2	
Crankcase upper and lower	Bolt	M 8	12	24	2.4	17	
	Bolt	M 6	22	12	1.2	8.7	
Breather plate	Screw	M 6	2	7	0.7	5.1	
2	Screw	M 6	4	7	0.7	5.1	
AC magneto cover	Bolt	M 6	5	10	1.0	7.2	
Crankcase cover 1	Bolt	M 6	5	10	1.0	7.2	
	Screw	M 5	4	4	0.4	2.9	

MAINTENANCE SPECIFICATIONS

SPEC 

B-8

Part to be tightened	Part name	Thread size	Q'ty	Tightening torque			Remarks
				Nm	m•kg	ft•lb	
Bearing plate	Bolt	M 6	2	10	1.0	7.2	
Crankcase cover 2	Bolt	M 6	7	10	1.0	7.2	
Plug (to crankcase 2)	-	M16	1	8	0.8	5.8	
Crankcase cover 3	Bolt	M 6	10	10	1.0	7.2	
	Screw	M 5	4	4	0.4	2.9	
Cover 1	Screw	M 6	1	7	0.7	5.1	
Plug (to crankcase 2)	-	M16	1	25	2.5	18	
Starter clutch assembly	Flange bolt	M10	1	80	8.0	58	
Starter clutch outer	Bolt	M 8	3	30	3.0	22	
Pressure plate	Bolt	M 5	5	6	0.6	4.3	
Clutch boss	Nut	M18	1	70	7.0	50	
Push lever assembly	Screw	M 5	2	4.5	0.45	3.3	
Push rod	Nut	M 8	1	16	1.6	11	
Drive sprocket	Nut	M18	1	70	7.0	50	
Stopper plate	Flange bolt	M 6	1	10	1.0	7.2	
Shift arm	Flange bolt	M 6	1	10	1.0	7.2	
Shift rod	Nut	M 6	2	10	1.0	7.2	
Stopper lever	Bolt	M 6	1	10	1.0	7.2	
Side plate	Screw	M 5	1	4	0.4	2.9	
AC magneto rotor	Bolt	M10	1	80	8.0	58	
Stator	Bolt	M 6	3	10	1.0	7.2	
Pick-up	Screw	M 5	2	5	0.5	3.6	
Starter motor	Flange bolt	M 6	2	10	1.0	7.2	
Neutral switch	Screw	M 6	2	4	0.4	2.9	
Oil pressure switch	-	-	1	12	1.2	8.7	
Thermo switch assembly	-	M16	1	22.5	2.25	16.3	
Thermo unit	-	-	1	15	1.5	11	
Oil pressure lead	Bolt	M 4	1	1	0.1	0.7	

MAINTENANCE SPECIFICATIONS

SPEC 

CHASSIS

Model	FZR400RR
Front suspension:	
Front fork travel	120 mm (4.72 in)
Fork spring free length	346 mm (13.6 in)
< Limit >	< 341 mm (13.4 in) >
Spring rate:	K1 6.5 N/mm (0.65 kg/mm, 36.4 lb/in)
Stroke:	K1 0.0 - 120 mm (0.0 - 4.72 in)
Optional spring:	No
Oil capacity:	509 cm ³ (17.9 imp oz, 17.2 US oz)
Oil level:	80 mm (3.15 in). From top of inner tube fully compressed without spring.
	Fork oil 10W or equivalent
Oil grade:	
Rear suspension:	
Shock absorber travel	70 mm (2.8 in)
Spring free length	205 mm (8.07 in)
Fitting length	200.5 mm (7.9 in)
Spring rate:	K1 59 N/mm (5.9 kg/mm, 330 lb/in)
Stroke:	K1 0.0 - 70 mm (0.0 - 2.8 in)
Optional spring:	No
Enclosed gas pressure:	
Standard	1,220 kPa (112.2 kg/cm ² , 174 psi)
Spring preload (Adjuster position):	
Standard	5
Minimum	1
Maximum	9
Drive chain:	
Type/Manufacturer:	RK428SMD, YAMASAGO.
No. of links	139
Chain free play	35 - 45 mm (1.38 - 1.77 in)

MAINTENANCE SPECIFICATIONS

SPEC



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MAINTENANCE SPECIFICATIONS

SPEC



TIGHTENING TORQUE

Part to be tightened	Thread size	Tightening torque			Remarks
		Nm	m·kg	ft·lb	
Handle crown and inner tube	M 8	22	2.2	17	
Handle crown and steering shaft	M22	110	11.0	80	
Handlebar and inner tube	M 8	22	2.2	17	
Handlebar and handle crown	M 8	22	2.2	17	
Steering shaft and ring nut	M 6	6	0.6	4.3	See "NOTE"
Under bracket and inner tube	M10	38	3.8	27	
Brake hose joint and under bracket	M 6	10	1.0	7.2	
Handle crown and main switch	M 6	10	1.0	7.2	
Front master cylinder	M 6	10	1.0	7.2	
Brake hose and union bolt	M10	26	2.6	19	
Upper cowl and stay	M 6	4	0.4	2.9	
Upper cowl and lower cowl	M 5	3	0.3	2.2	
Front flasher light and stay	M 8	16	1.6	11	
Engine mounting bolt (front)	M10	40	4.0	29	
(rear upper)	M10	55	5.5	40	
(rear lower)	M10	55	5.5	40	
(front pinion bolt)	M 8	23	2.3	17	
Frame and rear frame	M 8	33	3.3	24	
Frame and engine bracket (rear)	M 8	33	3.3	24	
Pivot shaft nut	M18	90	9.0	6.5	
Relay arm and frame	M10	40	4.0	29	
Relay arm and arm	M10	40	4.0	29	
Rear arm and arm	M10	40	4.0	29	
Rear shock absorber and relay arm	M10	40	4.0	29	
Rear shock absorber and bracket	M10	40	4.0	29	
Frame and rear shock absorber bracket	M 6	52	5.2	37	
Chain case	M 6	7	0.7	5.1	
Seal garter	M 6	7	0.7	5.1	
Rear brake hose holder	M 6	7	0.7	5.1	
Fuel tank	M 6	7	0.7	5.1	
Fuel cock	M 6	7	0.7	5.1	
Fuel sender	M 6	7	0.7	5.1	
Reservoir tank	M 6	7	0.7	5.1	
Rear fender	M 6	7	0.7	5.1	
Rear flasher light	M 8	16	1.6	11	
Front fork cap bolt		23	2.3	17	
Front fork damper bolt		62	6.2	45	
Front wheel axle holder	M 8	20	2.0	14	
Front wheel shaft	M16	75	7.5	54	
Rear wheel shaft and nut	M18	105	10.5	75	
Front caliper and front fork	M10	35	3.5	25	
Rear caliper and bracket	M10	35	3.5	25	
Rear caliper bracket		55	5.5	40	

Part to be tightened	Thread size	Tightening torque			Remarks
		Nm	m·kg	ft·lb	
Brake caliper retaining pin	M 8	10	1.0	7.2	
Brake disc and hub	M 8	20	2.0	14	
Rear wheel sprocket and hub	M 8	43	4.3	31	
Bleed screw and caliper	M 8	6	0.6	4.3	
Sidestand bolt	M10	46	4.6	33	
Sidestand locknut	M10	39	3.9	28	
Bracket footrest and frame	M 8	22	2.2	16	
Rear master cylinder and frame	M 8	22	2.2	16	
Rear brake reservoir tank and frame	M 6	4	0.4	2.9	

NOTE:

1. First, tighten the ring nut approximately 38 Nm (3.8 m·kg, 27 ft·lb) by using the torque wrench, then loosen the ring nut one turn.
2. Retighten the ring nut to specification.



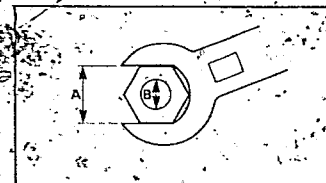
ELECTRICAL

Model	FZR400RR
Ignition coil: Model/Manufacturer Minimum spark gap Primary winding resistance Secondary winding resistance Spark plug-cap: Type Resistance	CM12-43/HITACHI 6 mm (0.24 in) 1.8 - 2.2Ω at 20°C (68°F) 9.6 - 14.4 Ω at 20°C (68°F) Resin type 10 ⁴ kΩ at 20°C (68°F)
A.C. Generator: Model/Manufacturer Nominal output Stator coil resistance	FL 118-17/HITACHI 12V 20.5A at 5,000 r/min 0.31 - 0.41Ω at 20°C (68°F) (White - White)
Rectifier/Regulator: Model/Manufacturer Type Voltage regulator No load regulated voltage Rectifier Capacity Withstand voltage	SH629A-12/SHINDENGEN Semiconductor - Short circuit type 14.3 - 15.3V 25A 240V
Electrical starter system: Type Starter motor: Model/Manufacturer Output Brush - overall length < Limit > Commutator dia. Wear limit Mica undercut (Deep) Starter relay: Model/Manufacturer Amperage rating	Constant mesh type 3HE/YAMAHA 0.7 kW 12.5 mm (0.49 in) < 4 mm (0.16 in) > 28.0 mm (1.10 in) 27.0 mm (1.06 in) 0.7 mm (0.028 in) MS5D-201/HITACHI 100A
Flasher relay (Relay assembly): Type Model/Manufacturer Self cancelling device Flasher frequency Wattage	Semi transistor type GBA-101-03/OMRON No 60 - 120 cpl/min 21W x 2 + 3.4W
Thermostat switch: Model/Manufacturer Function temperature	2EL/N, THERMOSTAT 102 - 108°C (216 - 226°F): ON 98 - 101°C (208 - 214°F): OFF

GENERAL TORQUE SPECIFICATIONS

This chart specifies torque for standard fasteners with standard 1.5.0. pitch threads. Torque specifications for special components or assemblies are included in the applicable sections of this book. To avoid warpage, tighten multi-fastener assemblies in a crisscross fashion, in progressive stages, until full torque is reached. Unless otherwise specified, torque specifications call for clean, dry threads. Components should be at room temperature.

A (Nut)	B (Bolt)	General torque specifications		
		Nm	m.kg	ft.lb
10 mm	6 mm	5	0.6	4.3
12 mm	8 mm	15	1.5	11
14 mm	10 mm	30	3.0	22
17 mm	12 mm	55	5.5	40
19 mm	14 mm	85	8.5	61
22 mm	16 mm	130	13.0	94



A Distance across flats
B Outside thread diameter

LUBRICATION POINT AND GRADE OF LUBRICANT




























SPEC

09

B-1-1

LUBRICATION POINT AND GRADE OF LUBRICANT

ENGINE





















Lubrication point	Lubricant type
Oil seal lips	
O-ring	
Bearing	
Piston surface	
Piston-pin	
Connecting rod (Big and small end)	
Connecting rod bolt	
Crankshaft journal	
Camshaft cam lobe/journal	
Valve stem (IN, EX)	
Valve stem end (IN, EX)	
Water pump mechanism seal revolution side	Coolant and water
Water pump impeller shaft	
Water pipe or hose	Silicon grease
Oil pump rotor (Inner/outer) shaft	
Oil level gauge	
Cylinder head (Bolt thread)	
Valve lifter outside	
Camshaft cap (Bolt thread)	
Cylinder sleeve (O-ring)	Silicon grease
Starter idler gear (Inner gear)	
Starter idler gear shaft	
Push lever assembly	
Clutch push rod	
Transmission gear (Wheel/pinion)	
Axle (Main/drive)	
Shift cam	
Shift fork/guide bar	
Shift shaft assembly	
Shift boss (Inner)	
Matching surface (Cylinder head and cylinder head cover)	Yamaha Bond No. 1215
Crankcase matching surface	Yamaha Bond No. 1215

LUBRICATION POINT AND GRADE OF LUBRICANT

SPEC

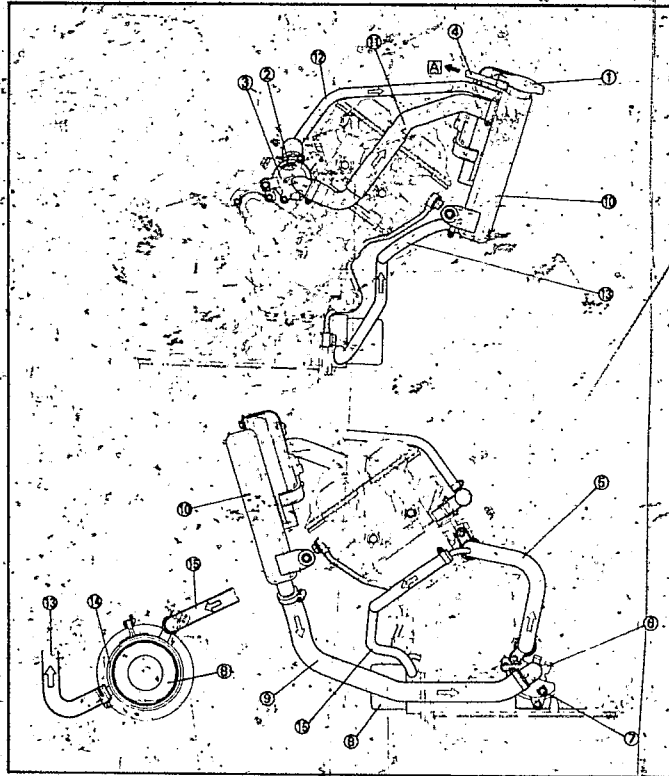
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CHASSIS

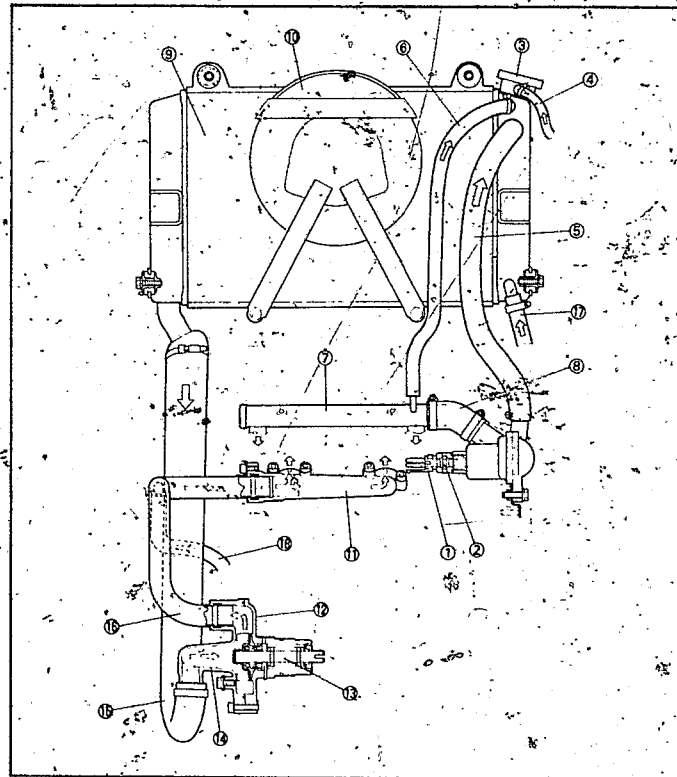
Lubrication point	Lubricant type
Gear unit (Speedometer)	
Front wheel oil seal lips	
Rear wheel oil seal lips	
Bush (Swingarm) and thrust cover	
Oil seal lips (Swingarm) and bearing	
Pivot shaft (Swingarm)	
Bearing (Relay arm and rear shock absorber)	
Bearing (Relay arm and frame)	
Bearing (Relay arm and connecting rod)	
Bearing (Connecting rod and swingarm)	
Shift pedal shaft	
Bearing (Steering head)	
Tube guide (Throttle grip) inner surface	
Brake lever, sliding surface	
Clutch lever, sliding surface	
Clutch cable end	
Sidestand bolt, sliding surface	
Swingarm	
Relay arm	
Brake pedal and rear master cylinder	

COOLANT DIAGRAM

- ① Radiator cap
- ② Thermostatic valve
- ③ Reservoir tank hose
- ④ Water pipe
- ⑤ Water pump
- ⑥ Drain bolt
- ⑦ Oil filter
- ⑧ Radiator hose (outlet)
- ⑩ Radiator
- ⑪ Radiator hose #1 (inlet)
- ⑫ Radiator hose #2 (inlet)
- ⑬ Oil cooler hose (outlet)
- ⑭ Oil cooler
- ⑮ Oil cooler hose (inlet)
- △ To reservoir tank



- ① Thermo switch
- ② Thermo unit
- ③ Radiator cap
- ④ Reservoir tank hose
- ⑤ Radiator hose #1 (inlet)
- ⑥ Radiator hose #2 (inlet)
- ⑦ Radiator pipe 1
- ⑧ Radiator hose
- ⑨ Radiator
- ⑩ Fan motor assembly
- ⑪ Water jacket joint
- ⑫ Water pump housing
- ⑬ Water pump
- ⑭ Water pump cover
- ⑮ Radiator hose (outlet)
- ⑯ Water pipe
- ⑰ Oil cooler hose (outlet)
- ⑱ Oil cooler hose (inlet)

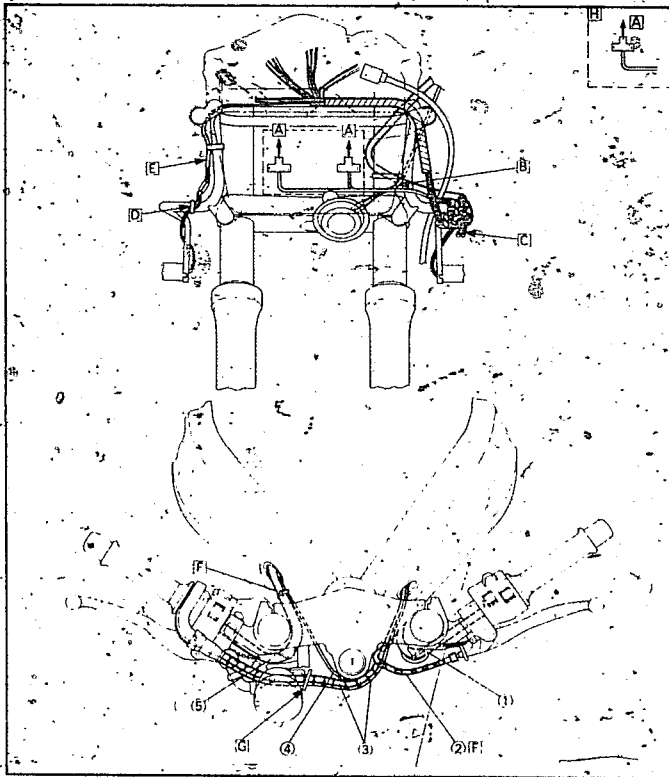




CABLE ROUTING

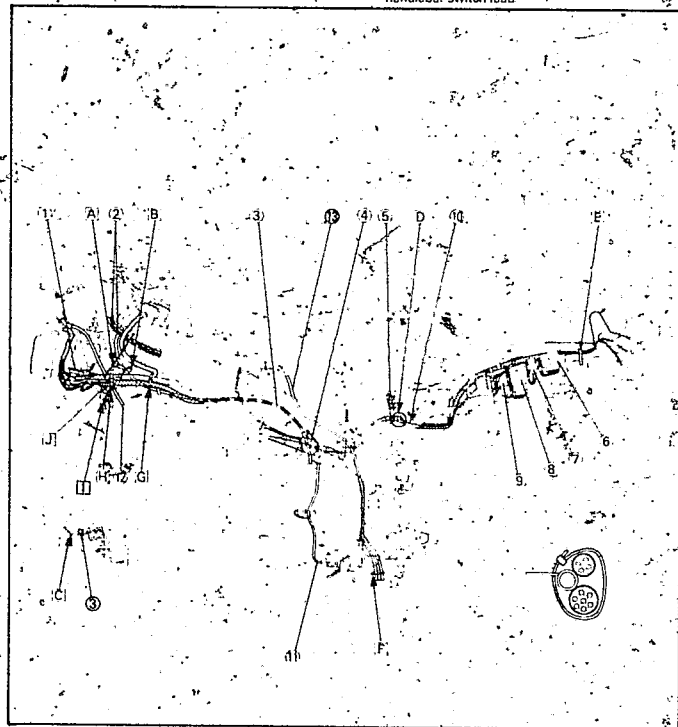
- ① Handlebar switch lead (left)
- ② Clutch cable
- ③ Throttle cable
- ④ Main switch lead
- ⑤ Handlebar switch lead (right)

- A To headlight.
- B To horn.
- C To front flasher light (left).
- D Clamp the flasher light lead.
- E To front flasher light (right)
- F Through inside of throttle cable to under the frame.
- G Through the throttle cables.
- H For F.



- ① Headlight lead
- ② Throttle cable
- ③ Clutch cable
- ④ Starter
- ⑤ Cross tube
- ⑥ Fuse box
- ⑦ Main fuse
- ⑧ Relay
- ⑨ Flasher relay
- ⑩ EX-UP lead
- ⑪ Sidestand switch lead
- ⑫ Speedometer cable
- ⑬ Air cleaner drain hose

- A Clamp the horn lead
- B Connect the fuel tank reserve switch
- C Through to clutch cable over the cable guide
- D Through to the main harness, radiator reservoir hose, over flow hose, ground lead, EX-UP lead, and starter motor (-) lead over the cross tube
- E Clamp the flasher light lead and taillight lead.
- F Clamp the air filter breather hose, fuel tank breather hose, and over flow hose
- G Clamp the main harness and handlebar switch lead (left)
- H Through the guide.
- I Through the flasher light leads (left and right) under the bracket hole.
- J Clamp the flasher light lead, main harness and handlebar switch lead



CABLE ROUTING

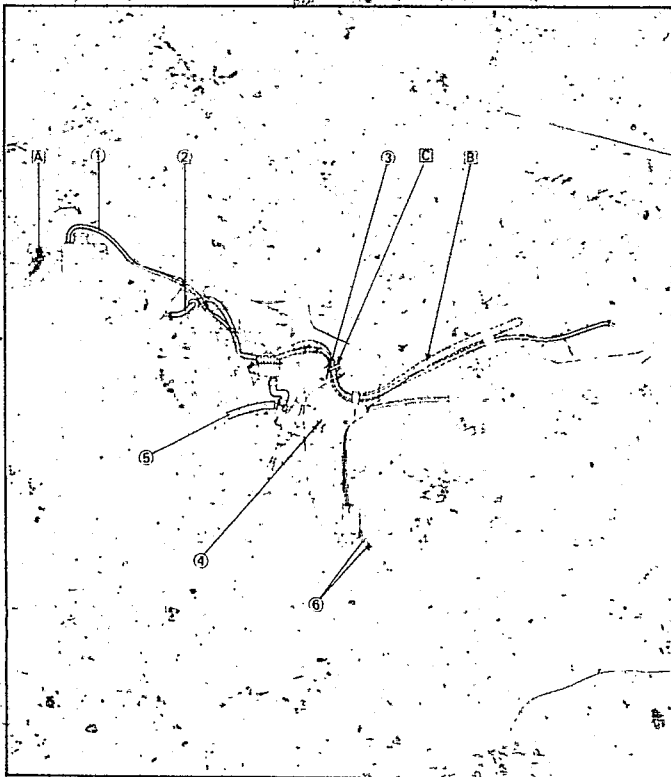
SPEC



B-14

- ① Reservoir tank over flow hose
- ② Reservoir hose
- ③ Brake switch lead
- ④ Rear brake switch
- ⑤ Brake hose
- ⑥ EX-UP cable

- A Clamp the flasher light lead (right)
- B Through the reservoir hose inside of tank rail.
- C Clamp the brake switch leads and main harness.



CABLE ROUTING

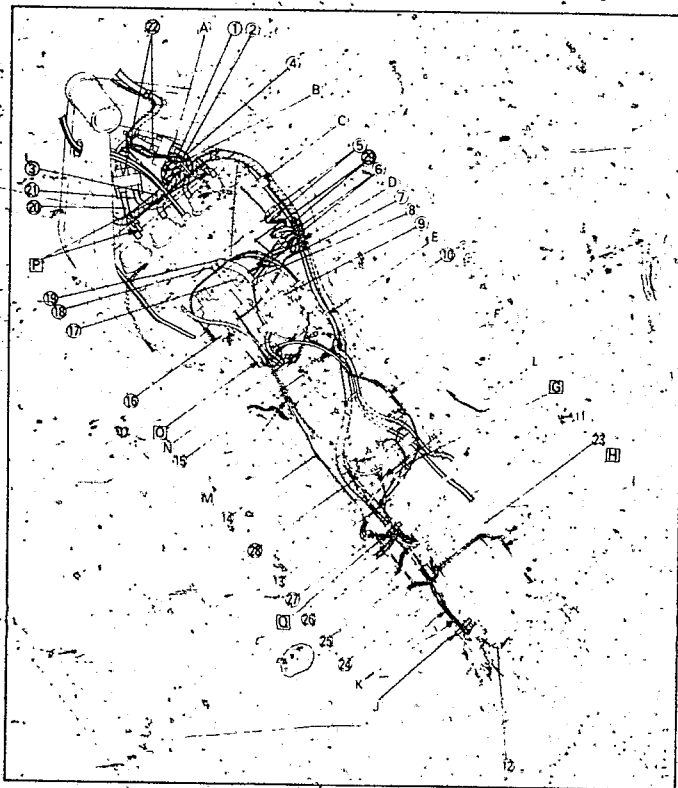
SPEC



- ① Main switch coupler (red)
- ② Handlebar switch coupler (white)
- ③ High tension cord # 2
- ④ High tension cord # 3
- ⑤ Thermo switch/Thermo unit (white)
- ⑥ AC magneto coupler (white)
- ⑦ Sidestand lead (blue)
- ⑧ Fuel pump lead
- ⑨ Fuel pump
- ⑩ Rear brake switch coupler

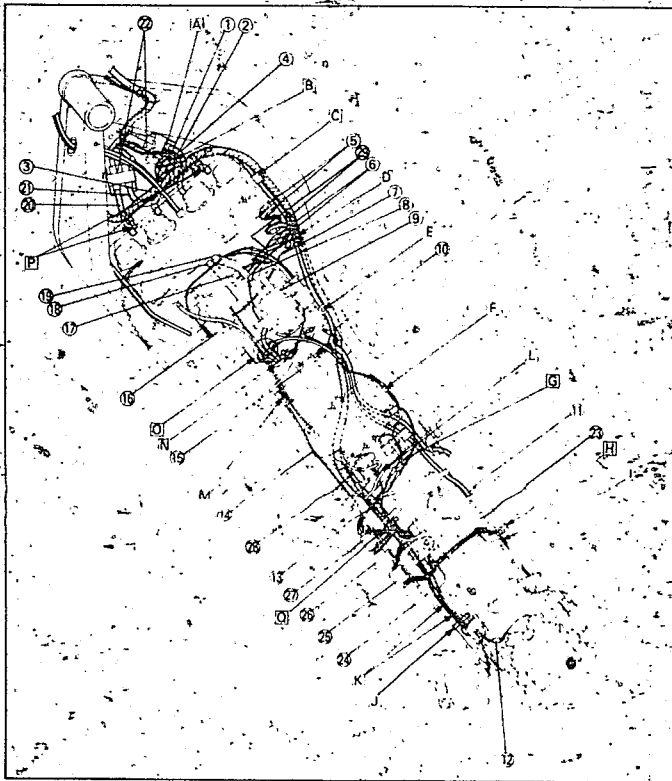
- ⑪ Over flow hose
- ⑫ Taillight coupler (white)
- ⑬ EX-UP test terminal
- ⑭ EX-UP lead
- ⑮ Regulator
- ⑯ EX-UP motor
- ⑰ Starter motor lead
- ⑱ Air/filter breather hose
- ⑲ Fuel hose (to carburetor)
- ⑳ High tension cord # 1

- ㉑ High tension cord # 4
- ㉒ Ignitor coil
- ㉓ Ignitor unit
- ㉔ Fuse box
- ㉕ Main fuse
- ㉖ Relay
- ㉗ Flasher relay
- ㉘ Starter relay
- ㉙ Neutral and oil pressure gauge





- A** To fan
B Clamp the handlebar lead (right), main switch lead, fan lead and main harness.
C Clamp the main harness and radiator reservoir hose.
D Clamp the main harness, sidestand lead, AC magneto lead, thermo switch lead, fuel pump lead, neutral lead and oil pressure lead.
E Clamp the main harness and radiator reservoir hose.
F Clamp the ground lead ⊕.
G Clamp the ground lead ⊕ and resistor lead.
H Clamp the flasher lead.
I To the rear flasher light (right).
J Clamp the flasher light lead and taillight lead.
K To the rear flasher light (left).
L Clamp the main harness, starter relay, EX-UP lead and ⊕ lead.
M Clamp the EX-UP lead and starter motor lead.
N Pass through the EX-UP cables.
O Clamp the air filter hose breather hose over flow hose, EX-UP lead and starter motor lead.
P Clamp the main harness to the frame.
Q Clamp the main harness and flasher right lead (F).



PERIODIC INSPECTION AND ADJUSTMENT COVERS/FUEL TANK REMOVAL AND INSTALLATION REMOVAL

Covers

- 1 Remove
 - Passenger seat 1

NOTE:

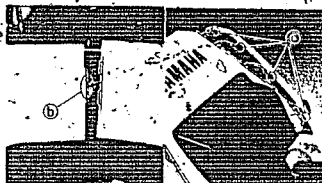
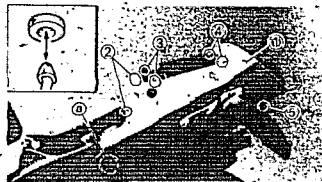
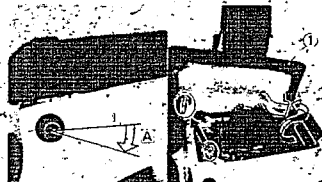
Insert the key into the lock and turn it clockwise. **A** to release the seat lock.

- 2 Remove
 - Bolt 1
 - Rider seat 2

- 3 Remove:
 - Side covers (left and right) 1

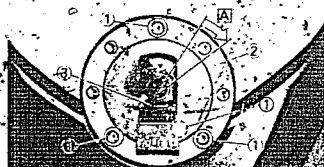
Removal steps:

- Remove the screws 2, 3, 4, 5
- Unhook the projections ② on the side cover from the grommets on the frame
- Unhook the hooks ①, ③ on the side cover from the slots on the tail cover





4. Remove.
- Tail cover (1)

**Fuel tank**

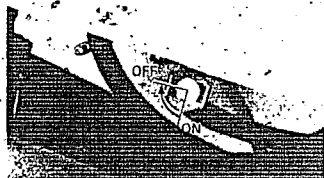
1. Remove.
- Socket head bolt (1)
 - Fuel tank cap (2)

NOTE:

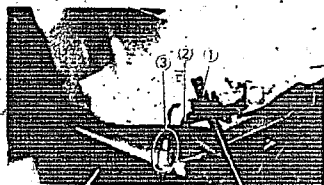
Insert the key (3) into the lock and turn it clockwise 1/4 turn (A) to release the fuel tank cap (2).



2. Remove.
- Fuel tank installing bolts (1)



3. Turn the fuel cock "OFF"



4. Disconnect.
- Breather hose (1)
 - Fuel hose (2)
 - Fuel sender coupler (3)

5. Remove.
- Fuel tank

**INSTALLATION**

Reverse the "REMOVAL" procedure. Note the following points.

1. Install.
- Rider seat
 - Passenger seat

NOTE:

When installing the seat, insert the lobe on the rear into the stay of the frame.

DRIVE CHAIN SLACK ADJUSTMENT

INSP
ADJ.



C-1

CHASSIS

DRIVE CHAIN SLACK ADJUSTMENT

NOTE:

Before checking and/or adjusting, rotate the rear wheel several revolutions and check slack at several points to find the tightest point. Check and/or adjust the chain slack with the rear wheel in this "tightest" position.

CAUTION:

Too little of chain slack will overload the engine and other vital parts. Keep the slack within the specified limits.

WARNING:

Securely support the motorcycle so there is no danger of it falling over.

- 1 Place the motorcycle on a level place and hold it in an upright position.

NOTE:

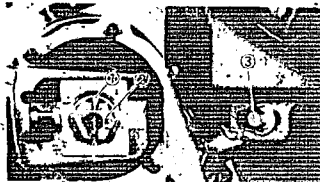
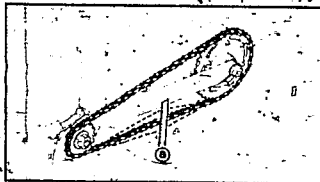
Both wheels should be on the ground without the rider on it.

- 2 Check
 - Drive chain slack (A)
 - Out of specification—Adjust.



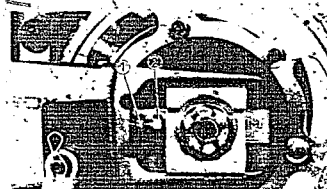
Drive chain slack
35–45 mm (1.38–1.77 in)
with both wheels on ground
without rider.

- 3 Remove
 - Cotter pin (1)
- 4 Loosen
 - Axle nut (2)
 - Bolt (3) (brake caliper bracket)



DRIVE CHAIN SLACK ADJUSTMENT

INSP
ADJ.



- 5 Adjust
 - Drive chain slack.

Adjustment steps.

- Loosen the locknut(s) (1).
- Turn the adjuster(s) (2) in or out until the specified slack is obtained.

Turning in—Slack is increased

Turning out—Slack is decreased

NOTE:

Turn each adjuster exactly the same amount to maintain correct axle alignment. (There are five marks on each side of swingarm and on each chain puller. Use them to check for proper alignment.)

- Tighten the axle nut to specification while pushing up or down on the chain to zero slack.



Axle nut:
105 Nm (10.5 m•kg, 75 ft•lb)

- Tighten the locknut(s).

6. Install
 - Cotter pin (1)

CAUTION:

Do not loosen the axle nut after torque tightening. If the axle nut groove is not aligned with the cotter pin hole, align groove with the hole by tightening up on the axle nut.

WARNING:

Always use a new cotter pin.

Tighten

- Bolt (brake caliper bracket)



Bolt (brake caliper bracket):
35 Nm (3.5 m•kg, 25 ft•lb)

FRONT FORK ADJUSTMENT/ REAR SHOCK ABSORBER ADJUSTMENT



C-2

FRONT FORK ADJUSTMENT

- 1 Spring preload
This model does not have the above mechanism.

78032012

REAR SHOCK ABSORBER ADJUSTMENT

WARNING

Securely support the motorcycle so there is no danger of it falling over.

Spring preload

1. Adjust.
 - Spring preload
 - Turn the adjuster **1** to direction **a** or **b**.

Turning toward **a** - Spring preload is harder.

Turning toward **b** - Spring preload is softer.

Adjuster position:

Standard: 5

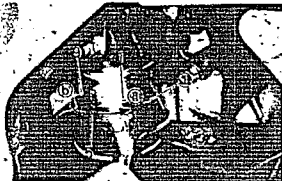
Minimum: 1

Maximum: 9

CAUTION:

Never turn the adjuster beyond the maximum or minimum setting.

- 2 Rebound damping/compression damping
This model does not have the above mechanism.



ENGINE REMOVAL/ INSPECTION AND REPAIR/ ENGINE ASSEMBLY AND ADJUSTMENT

ENG



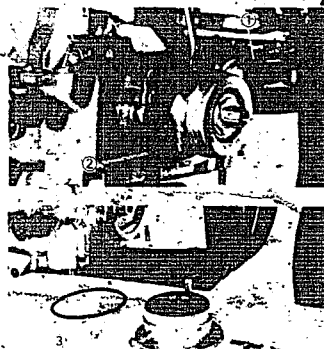
78034100

ENGINE OVERHAUL

ENGINE REMOVAL

NOTE:

Please insert this section between oil filter and clutch cable.



OIL COOLER

- 1 Disconnect.
 - Inlet hose (oil cooler) 1
 - Outlet hose (oil cooler) 2
- 2 Remove.
 - Bolt 1 (bypass valve included)
 - Oil cooler 2
 - O-ring 3

INSPECTION AND REPAIR

OIL COOLER

- 1 Inspect.
 - Oil cooler
 - Cracks/Damage - Replace
- 2 Inspect.
 - Inlet hose (oil cooler)
 - Outlet hose (oil cooler)
 - Cracks/Wear/Damage - Replace

ENGINE ASSEMBLY AND ADJUSTMENT

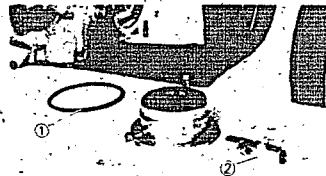
REMOUNTING ENGINE

NOTE:

Please add the following steps after the oil filter installation.

OIL COOLER

1. Clean the mating surfaces of the oil cooler and the crankcase with a cloth dampened with thinner.



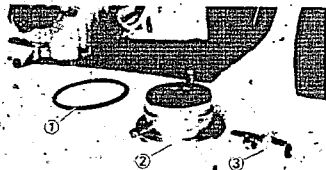
- 2 Lubricate:
- O-ring (oil cooler) ①
 - Bolt ②



Engine oil

WARNING

Always use a new O-ring on the oil cooler.



- 3 Install
- O-ring (oil cooler) ①
 - Oil cooler ②
 - Bolt ③
- (bypass valve included)

NOTE:

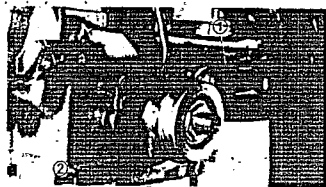
- Make sure the O-ring ① is positioned properly.
- Insert the projection ③ between the two bypasses ⑤.



• Bolt (oil cooler):
63 Nm (6.3 m•kg, 45 ft•lb)



- 4 Connect:
- Inlet hose (oil cooler) ①
 - Outlet hose (oil cooler) ②

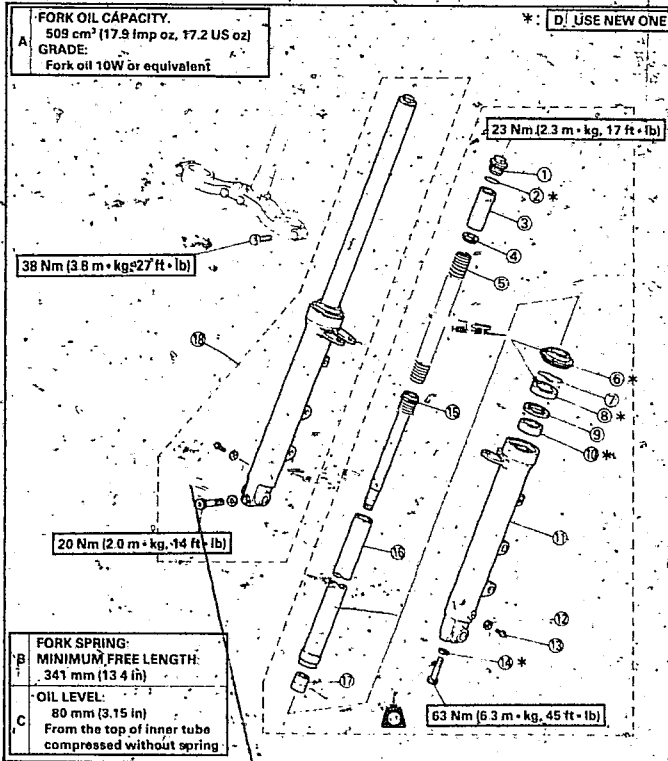


FRONT FORK

- 1 Cap bolt
- 2 O-ring
- 3 Spacer
- 4 Spring seat
- 5 Fork spring
- 6 Dust seal
- 7 Stopper ring
- 8 Oil seal
- 9 Plate washer

CHASSIS

- 10 Slide metal
- 11 Outer tube
- 12 Gasket
- 13 Drain screw
- 14 Copper washer
- 15 Damper rod assembly
- 16 Inner tube
- 17 Oil lock piece
- 18 Front fork assembly (right)



FR174001

REMOVAL

WARNING

Support the motorcycle securely so there is no danger of it falling over.

- Remove:
 - Lower cowl
 - Upper cowl
 Refer to the "COWLING" section in the CHAPTER 3.
- Elevate the front wheel by placing a suitable stand under the engine.
- Remove:
 - Front wheel
 Refer to the "FRONT WHEEL-REMOVAL" section.
- Remove:
 - Holders (1) (brake hose)
 - Front fender (2)

- Remove:
 - Horn lead holder (1)
 - Reservoir tank stay (2)

- Loosen:
 - Pinch bolts (1) (handle crown)
 - Pinch bolts (2) (handlebar)
 - Cap bolts (3)

- Loosen:
 - Pinch bolts (1) (lower bracket)

WARNING

Support the fork before loosening the pinch bolt.

- Remove:
 - Front fork

DISASSEMBLY

- Remove:
 - Cap bolt (1)
 - Spacer (2)
 - Spring seat (3)
 - Fork spring (4)

- Drain:
 - Fork oil

- Remove:
 - Dust seal (1)

NOTE:

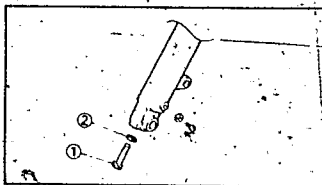
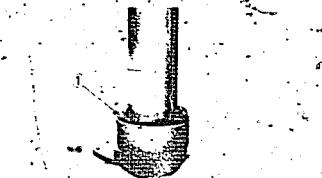
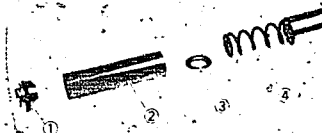
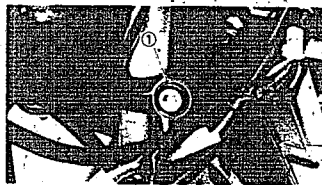
Use a thin screwdriver, and be careful not to scratch the inner fork tube.

- Remove:
 - Stopper ring (1)

NOTE:

Use a thin screw driver and be careful not to scratch the inner fork tube.

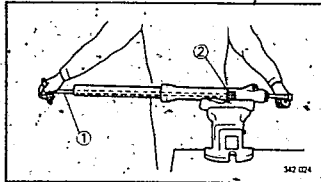
- Remove:
 - Bolt (damper rod) (1)
 - Copper washer (2)



FRONT FORK


CHAS 

C-5



NOTE

Hold the damper rod loosen the bolt (damper rod) by the T-handle ① and holder ②.

 T-handle:
90890-01326
Holder:
90890-01327

6. Remove:
- Damper rod ①
 - Spring ②

7. Remove:
- Inner tube

Removal steps:

- Hold the fork leg horizontally.
- Clamp the caliper mounting boss of the outer tube securely in a vise with soft jaws.
- Pull out the inner fork tube from the outer tube by forcefully, but carefully, with drawing the inner tube.

CAUTION:

- Excessive force will damage the oil seal and/or the bushes. Damaged oil seal and bushing must be replaced.
- Avoid bottoming the inner tube in the outer tube during the above procedure, as the oil lock piece will be damaged.

8. Remove
- Oil seal ①
 - Plate washer ②
 - Slide metal ③
 - Piston metal ④
 - Oil lock piece ⑤

FRONT FORK

CHAS 

No. 74007

INSPECTION

1. Inspect
- Inner fork tube ①
 - Damper rod ②
 - Spring ③
- Scratches/Bends/Damages—Replace.

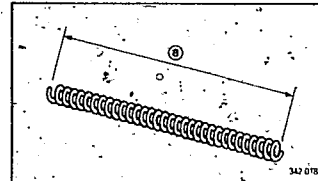
WARNING


Do not attempt to straighten a bent inner fork tube as this may dangerously weaken the tube.



2. Measure.

- Fork spring (large) free length ④
- Out of specification—Replace



 Fork spring (large) free length:
346 mm (13.6 in)
Minimum free length:
341 mm (13.4 in)

3. Inspect

- Oil lock piece ①
 - O-ring ② (cap nut)
- Damage—Replace



FRONT FORK



C-6

VER574009

ASSEMBLY

Reverse the "DISASSEMBLY" procedure.
Note the following points.

NOTE:

- In front fork reassembly, be sure to use following new parts:
- Guide bush
- Slide bush
- Oil seal
- Dust seal
- Make sure all components are clean before re-assembly

1. Install

- Piston metal (1) to the inner tube

2. Install:

- Inner tube (1)
- Damper rod assembly (2)
- Oil lock piece (3) to the outer tube

CAUTION:

Allow the damper rod to slide slowly down the inner fork tube until it protrudes from the bottom, being careful not to damage the inner fork tube.

3. Install

- Copper washer (new)
- Bolt (damper rod)

4. Tighten.

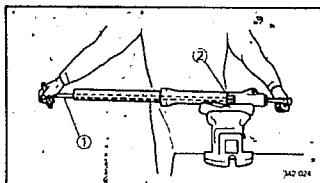
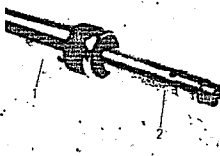
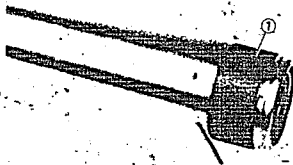
- Bolt (damper rod)



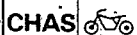
Bolt (damper rod):
63 Nm (6.3 m•kg, 45 ft•lb)
LOCTITE®

NOTE:

Tighten the bolt (damper rod) while holding the damper rod with the T-handle (1) and holder (2).



FRONT FORK



T-handle:
90890-01326
Holder:
90890-01327

5. Install:

- Slide metal (1)
- Plate washer (2)
- Oil seal (3)

Use the fork seal driver weight (4) and adapter (5).



Fork seal driver weight:
P/N 90890-01367
Adapter:
P/N 90890-01374

CAUTION:

Be sure that the oil seal numbered side face upward.

NOTE:

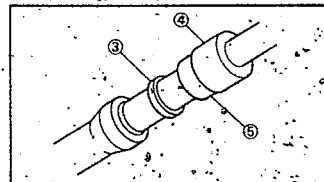
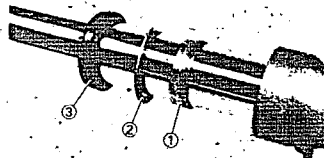
Before installing the oil seal, apply the lithium soap base grease onto the oil seal lips.

6. Install

- Stopper ring (1)
- Dust seal

NOTE:

Fit the stopper ring correctly in the groove in the outer tube.



FRONT FORK



C-7

- 7 Fill
 • Front fork oil
 until top of inner tube end



Fork oil grade:
 Fork oil 10WT or equivalent

- 8 Measure
 • Fork oil level



Oil level @:
 80 mm (3.15 in)
 From the top of inner tube,
 compressed without spring

- 9 Install.
 • Fork spring 1
 • Spring seat 2
 • Spacer 3

NOTE:

Place the flat surface of spring seat on upright position when installing the spring seat

- 10 Install.
 • O-ring 1
 • Cap bolt 2

NOTE:

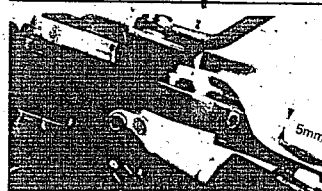
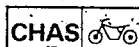
- Before installing the cap bolt, apply the grease to the O-ring
- Temporarily tighten the cap bolt with your finger

11. Install.
 • Inner tube

NOTE:

Temporarily tighten the inner tube

FRONT FORK



5013-0000

INSTALLATION

Reverse the "REMOVAL" procedure.
 Note the following points

- 1 Install
 • Front fork
 Temporarily tighten the pinch bolts

NOTE:

Position the inner fork tube end in such a way that it is 5 mm (0.2 in) with the top of the handle crown

- 2 Tighten:

- Pinch Bolts 1 (under bracket)



Pinch bolt (under bracket):
 38 Nm (3.8 m • kg, 27 ft • lb)



- 3 Tighten

- Cap bolt 1
- Pinch bolts 2 (handle crown)
- Pinch bolt 3 (handlebar)



Cap bolt
 23 Nm (2.3 m • kg, 17 ft • lb),
Pinch bolt (handle crown)
 22 Nm (2.2 m • kg, 17 ft • lb)
Pinch bolt (handlebar)
 22 Nm (2.2 m • kg, 17 ft • lb)



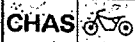
- 4 Install:

- Brake caliper



Bolt (brake caliper)
 35 Nm (3.5 m • kg, 25 ft • lb)

FRONT FORK



C-8

5. Install
• Front wheel



Wheel shaft:
75 Nm (7.5 m•kg, 54 ft•lb)
Pinch bolt (wheel shaft):
20 Nm (2.0 m•kg, 14 ft•lb)

Refer to the "FRONT WHEEL-INSTALLATION" section.

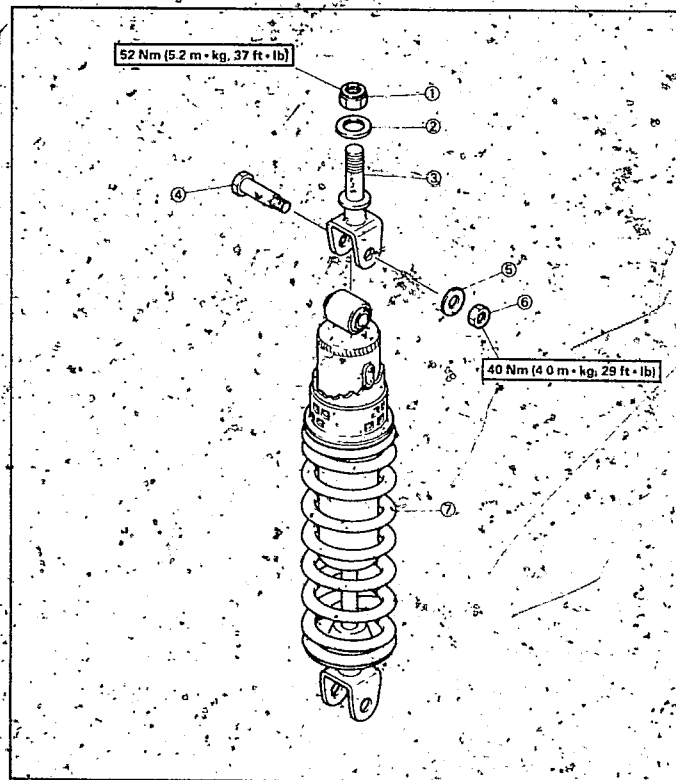
6. Adjust:
• Front fork setting
Refer to the "FRONT FORK ADJUSTMENT" section in the CHAPTER 3

REAR SHOCK ABSORBER AND SWINGARM



REAR SHOCK ABSORBER AND SWINGARM

1. Nut
2. Spacer
3. Bracket
4. Bolt
5. Plate washer
6. Nut
7. Rear shock absorber assembly





16176001

HANDLING NOTE**WARNING**

This shock absorber contains highly pressurized nitrogen gas. Read and understand the following information before handling the shock absorber. The manufacturer can not be held responsible for property damage or personal injury that may result from improper handling.

- Do not tamper with or attempt to open the cylinder assembly.
- Do not subject shock absorber to an open flame or other high heat source. This may cause the unit to explode due to excessive gas pressure.
- Do not deform or damage the cylinder in any way. Cylinder damage will result in poor damping performance.
- Take care not to scratch the contact surface of the piston rod with the cylinder; or oil could leak out.
- When scrapping the shock absorber, refer to the "NOTES ON DISPOSAL" section.

16176002

NOTES ON DISPOSAL**Disposal steps:**

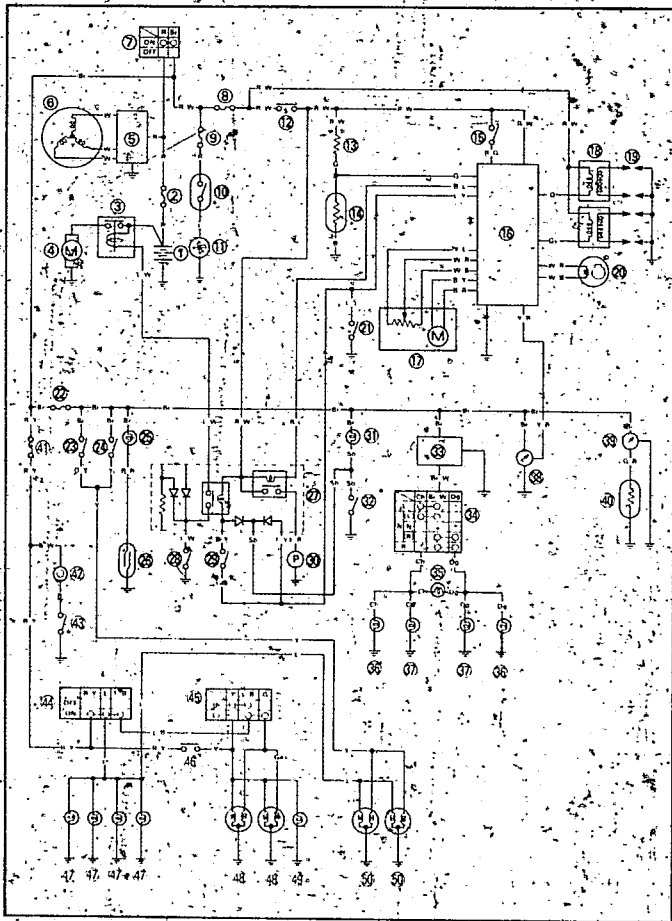
Gas pressure must be released before disposing of shock absorber. To do so, drill a 2-3 mm (0.08-0.12 in) hole, through the cylinder wall at a point 15-20 mm (0.6-0.8 in) from the end of the gas chamber.

WARNING

Wear eye protection to prevent eye damage from escaping gas and/or metal chips.

ELECTRICAL

FZR400RR CIRCUIT DIAGRAM (For GB)



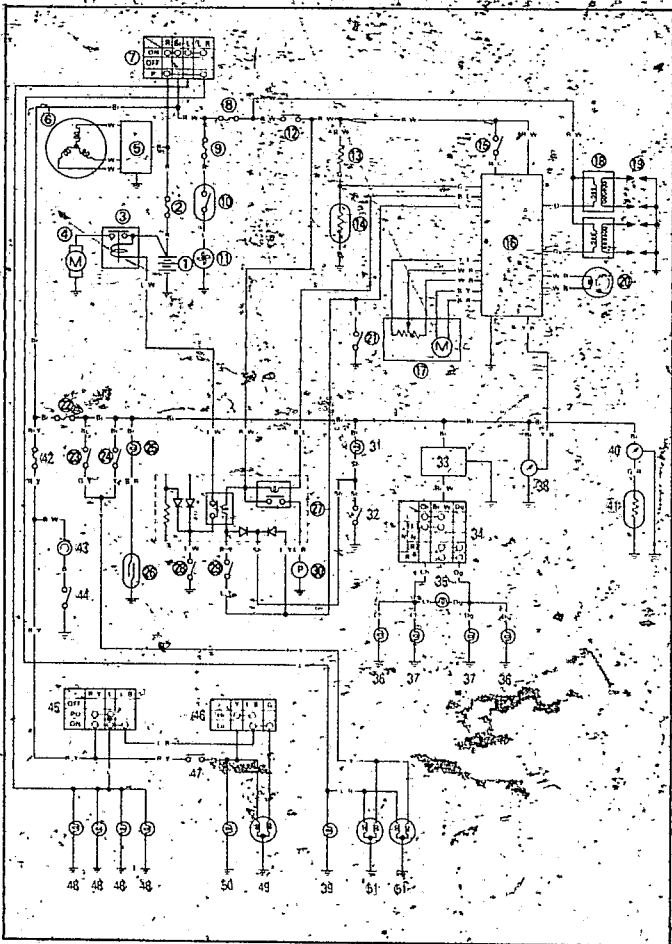
- | | |
|-----------------------------------|---------------------------------|
| 1) Battery | 36) Oil pressure switch |
| 2) Fuse (main) | 37) Relay |
| 3) Starter relay | 38) "START" switch |
| 4) Starter motor | 39) Clutch switch |
| 5) Rectifier/regulator | 40) Fuel pump |
| 6) AC magneto | 41) "NEUTRAL" indicator light |
| 7) Main switch | 42) Neutral switch |
| 8) Fuse (ignition) | 43) Flasher relay |
| 9) Fuse (fah) | 44) "TURN" signal switch |
| 10) Thermo switch | 45) "TURN" indicator light |
| 11) Fan motor | 46) Front flasher light |
| 12) "ENGINE STOP" switch | 47) Rear flasher light |
| 13) Resistor | 48) Tachometer |
| 14) Fuel sender | 49) Engine temperature gauge |
| 15) Reserve switch | 40) Thermo unit |
| 16) Ignitor | 41) Fuse (headlight) |
| 17) EXUP | 42) Horn |
| 18) Ignition coil | 43) "HORN" switch |
| 19) Spark plug | 44) "LIGHTS" switch |
| 20) Pick up | 45) "LIGHTS" (Dimmer) switch |
| 21) Sidestand switch | 46) "PASS" switch |
| 22) Fuse (signal) | 47) Meter light |
| 23) Front brake switch | 48) Headlight |
| 24) Rear brake switch | 49) "HIGH BEAM" indicator light |
| 25) "OIL" warning indicator light | 30) Tail/Brake light |

COLOR CODE

B	Black	-W	White	L/W	Blue/White
Br	Brown	Y	Yellow	L/Y	Blue/Yellow
Ch	Chocolate	B/L	Black/Blue	R/G	Red/Green
Dg	Dark green	B/R	Black/Red	R/Y	Red/Yellow
G	Green	B/W	Black/White	R/W	Red/White
Gy	Gray	B/Y	Black/Yellow	W/B	White/Black
L	Blue	Br/W	Brown/White	W/R	White/Red
O	Orange	G/R	Green/Red	Y/B	Yellow/Black
R	Red	G/Y	Green/Yellow	Y/L	Yellow/Blue
Sb	Sky blue	L/B	Blue/Black		



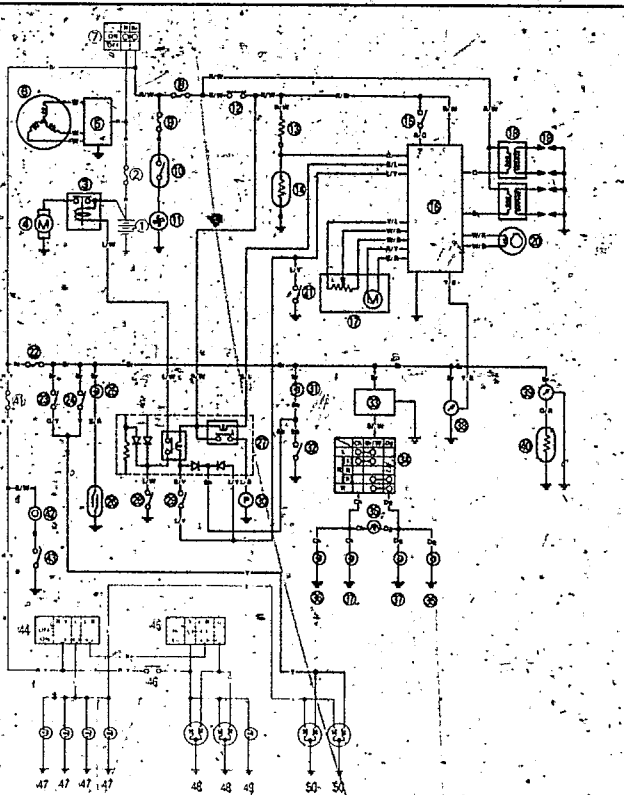
FZR400RR-CIRCUIT DIAGRAM (For F)



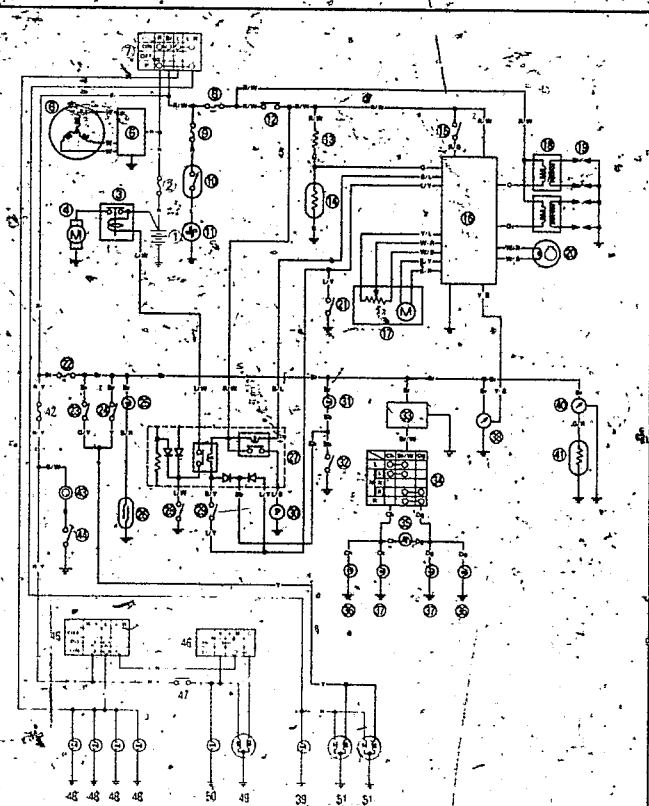
- 1 Battery
- 2 Fuse (main)
- 3 Starter relay
- 4 Starter motor
- 5 Rectifier/regulator
- 6 AC magneto
- 7 Main switch
- 8 Fuse (ignition)
- 9 Fuse (fan)
- 10 Thermo switch
- 11 Fan motor
- 12 "ENGINE STOP" switch
- 13 Resistor
- 14 Fuel sender
- 15 Reserve switch
- 16 Ignitor
- 17 EXUP
- 18 Ignition coil
- 19 Spark plug
- 20 Pick up
- 21 Sidestand switch
- 22 Fuse (signal)
- 23 Front brake switch
- 24 Rear brake switch
- 25 "OIL" warning indicator light
- 26 Oil pressure switch
- 27 Relay
- 28 "START" switch
- 29 Clutch switch
- 30 Fuel pump
- 31 "NEUTRAL" indicator light
- 32 Neutral switch
- 33 Flasher, relay
- 34 "TURN" signal switch
- 35 "TURN" indicator light
- 36 Front flasher light
- 37 Rear flasher light
- 38 Tachometer
- 39 Auxiliary light
- 40 Engine temperature gauge
- 41 Thermo unit
- 42 Fuse (headlight)
- 43 Horn
- 44 "HORN" switch
- 45 "LIGHTS" switch
- 46 "LIGHTS" (Dimmer) switch
- 47 "PASS" switch
- 48 Meter light
- 49 Headlight
- 50 "HIGH BEAM" indicator light
- 51 Tail/Brake light

COLOR CODE

B	Black	W	White	L/R	Blue/Red
Br	Brown	Y	Yellow	L/W	Blue/White
Cg	Chocolate	B/L	Black/Blue	L/Y	Blue/Yellow
Dh	Dark green	B/R	Black/Red	R/G	Red/Green
G	Green	B/W	Black/White	R/Y	Red/Yellow
Gy	Gray	B/Y	Black/Yellow	R/W	Red/White
L	Blue	Br/W	Brown/White	W/B	White/Black
O	Orange	G/R	Green/Red	W/R	White/Red
R	Red	G/Y	Green/Yellow	Y/B	Yellow/Black
Sb	Sky blue	L/B	Blue/Black	Y/L	Yellow/Blue

LIGHTING SYSTEM (For GB)
CIRCUIT DIAGRAM


- | | |
|-----------------------------|--------------------------------|
| 1 Battery | 46 "PASS" switch |
| 2 Fuse (main) | 47 Meter light |
| 7 Main switch | 48 Headlight |
| 41 Fuse (headlight) | 49 "HIGH BEAM" indicator light |
| 44 "LIGHTS" switch | 50 Tail/Brake light |
| 45 "LIGHTS" (Dimmer) switch | |

LIGHTING SYSTEM (For F)
CIRCUIT DIAGRAM


- | | |
|---------------------|--------------------------------|
| 1 Battery | 46 "LIGHTS" (Dimmer) switch |
| 2 Fuse (main) | 47 "PASS" switch |
| 7 Main switch | 48 Meter light |
| 41 Fuse (headlight) | 49 Headlight |
| 39 Auxiliary light | 50 "HIGH BEAM" indicator light |
| 42 Fuse (headlight) | 51 Tail/Brake light |
| 45 "LIGHTS" switch | |

TRUBLESHOOTING


HEADLIGHT "HIGH BEAM" INDICATOR LIGHT, TAILLIGHT, AUXILIARY LIGHT AND/OR METER LIGHT DO NOT COME ON.

Procedure

- Check:
- 1. Fuse (main and head)
 - 2. Battery
 - 3. Main switch
 - 4. "LIGHTS" switch
 - 5. "LIGHTS" (Dimmer) switch
 - 6. "PASS" switch
 - 7. Wiring connection (Entire lighting system)

NOTE:

- Remove the following parts before troubleshooting:
 - 1) Seat
 - 2) Tail cover
- Use the following special tool(s) in this troubleshooting.
 - 3) Fuel tank
 - 4) Air filter case

 **Pocket tester.**
90890-03112

1. Fuse (main and head)

- Remove the fuses
- Connect the pocket tester (1) to the fuses
- Check the fuses for continuity
- Refer to the "FUSE INSPECTION" in the CHAPTER 3

NOCONTINUITY

Replace fuse(s).

CONTINUITY

2. Battery

- Check the battery condition.
- Refer to the "BATTERY INSPECTION" section in the CHAPTER 3.

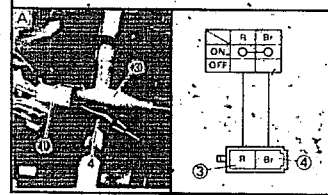
INCORRECT

- Clean battery terminals
- Recharge or replace battery.

CORRECT

3. Main switch

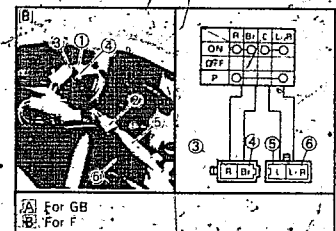
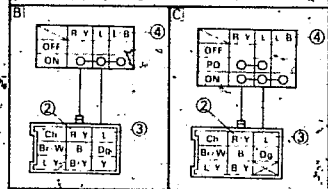
- Disconnect the main switch coupler, 1, 2 from the wireharness.
- Check the switch component for the continuity between "Red 3" and Brown 4" and "Blue 5" and Blue/Red 6 (F)", and "Red 3" and Blue/Red 6 (F)".
- Refer to the "CHECKING OF SWITCHES" section.



CORRECT

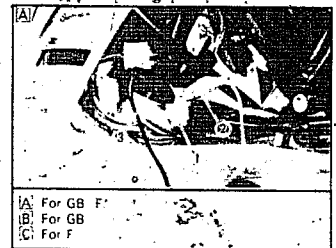
4. "LIGHTS" switch

- Disconnect the handlebar switch (left) coupler 1 from the wireharness.
- Check the switch component for the continuity between "Red/Yellow 2" and Blue 3" and "Red/Yellow 2" and Blue/Black 4".
- Refer to the "CHECKING OF SWITCHES" section



INCORRECT

Replace main switch.



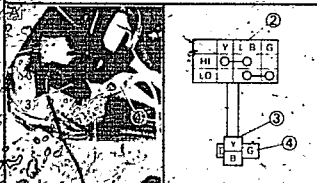
INCORRECT

Replace handlebar switch (left)

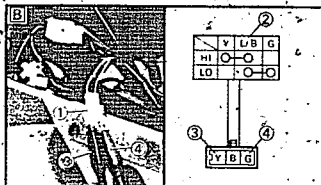


5. "LIGHTS" (dimmer) switch

- Disconnect the handlebar switch (left) coupler (1) from the wireharness.
- Check the switch component for the continuity between "Blue/Black (2) and Yellow (3)" and "Blue/Black (2) and Green (4)". Refer to the "CHECKING OF SWITCHES" section.



CORRECT



- [A] For GB
- [B] For F

INCORRECT

Replace handlebar switch (left).

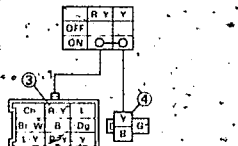
6 "PASS" switch

- Disconnect the handlebar switch (left) couplers (1), (2) from the wireharness.
- Check the switch component for the continuity between "Red/Yellow (3) and Yellow (4)". Refer to the "CHECKING OF SWITCHES" section.



INCORRECT

Replace handlebar switch (left)



7. Wiring connection

- Check the entire lighting system for connections. Refer to the "WIRING DIAGRAM" section.

POOR CONNECTION

Correct

CORRECT

Check condition of each circuit for lighting system. Refer to "LIGHTING SYSTEM CHECK" section.



LIGHTING SYSTEM CHECK

1. Headlight and "HIGH BEAM" indicator light do not come on.

1. Bulb and bulb socket

• Check the bulb and bulb socket for continuity. Refer to the "CHECKING OF BULBS" section.

NOCONTINUITY

Replace bulb and/or bulb socket

CONTINUITY

2. Voltage

• Connect the pocket tester (DC20V) to the headlight and "HIGH BEAM" indicator light-couplers.

Headlight:

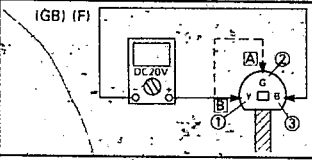
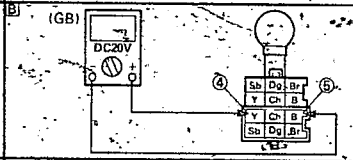
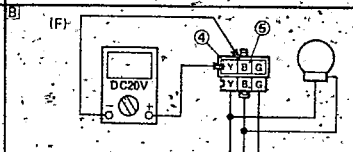
Tester (+) lead → Yellow ① or Green ② lead.

Tester (-) lead → Black ③ lead

"HIGH BEAM" indicator light:

Tester (+) lead → Yellow ④ lead

Tester (-) lead → Black ⑤ lead



Ⓐ When "LIGHTS" (dimmer) switch is "LO" position.
 Ⓑ When "LIGHTS" (dimmer) switch is "HI" position.

• Turn the main switch to "ON".
 • Turn the "LIGHTS" switch to "ON".
 • Turn the "LIGHTS" (dimmer) switch to "LO" or "HI" position.
 (• Push the "RASS" switch.)
 • Check voltage (12V) on the "Green" and "Yellow" lead at bulb socket connectors.

Wiring circuit from main switch to bulb socket connector is faulty, repair.

MEETS SPECIFICATION (12V)

This circuit is good.

Meter light does not come on.

1. Bulb and bulb socket

• Check the bulb and bulb socket for continuity. Refer to the "CHECKING OF BULBS" section.

NOCONTINUITY

Replace bulb and/or bulb socket

CONTINUITY

2. Voltage

• Connect the pocket tester (DC20V) to the bulb socket coupler ①, ②.

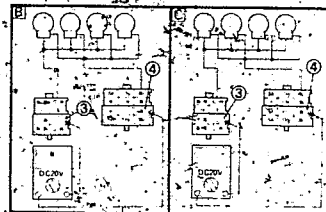
Tester (+) lead → Blue ③ terminal

Tester (-) lead → Black ④ terminal



Ⓐ For GB, F
 Ⓑ For GB
 Ⓒ For F.

• Turn the main switch to "ON".
 • Turn the "LIGHTS" switch to "PO" or "ON".
 • Check for voltage (12V) on the "Blue" lead at the bulb socket connector.



OUT OF SPECIFICATION

Wiring circuit from main switch to bulb socket connector is faulty, repair.

MEETS SPECIFICATION (12V)

This circuit is good.



3. Auxiliary light does not come on. (For F)

1. Bulb and bulb socket

• Check the bulb and bulb socket for continuity.
Refer to the "CHECKING OF BULBS" section.

CONTINUITY

2. Voltage

• Connect the pocket tester (DC20V) to the bulb socket connector.

Tester (+) lead - Blue/Red ① lead.
Tester (-) lead - Black ② lead

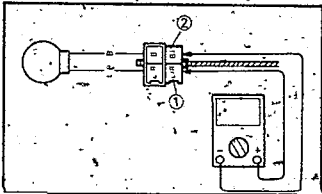
• Turn the main switch to "ON".
• Turn the "LIGHTS" switch to "OFF".
• Check for voltage (12V) on the Blue/Red lead at the bulb socket connector.

MEETS SPECIFICATION (12V)

This circuit is good.

NOCONTINUITY

Bulb and/or bulb socket are faulty, replace.



OUT OF SPECIFICATION

Wiring circuit from main switch to bulb socket connector is faulty, repair.



4. Taillight does not come on.

1. Bulb and bulb socket

• Check the bulb and bulb socket for continuity.
Refer to the "CHECKING OF BULBS" section.

CONTINUITY

2. Voltage

• Connect the pocket tester (DC20V) to the bulb socket connector.

Tester (+) lead - Blue/Red ① terminal
Tester (-) lead - Black ② terminal

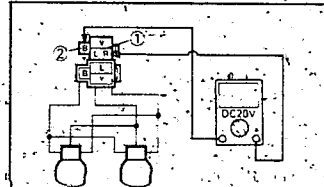
• Turn the main switch to "ON".
• Turn the "LIGHTS" switch to "OFF".
• Check for voltage (12V) on the Blue/Red lead at the bulb socket connector.

MEETS SPECIFICATION (12V)

This circuit is good

NOCONTINUITY

Replace bulb and/or bulb socket.

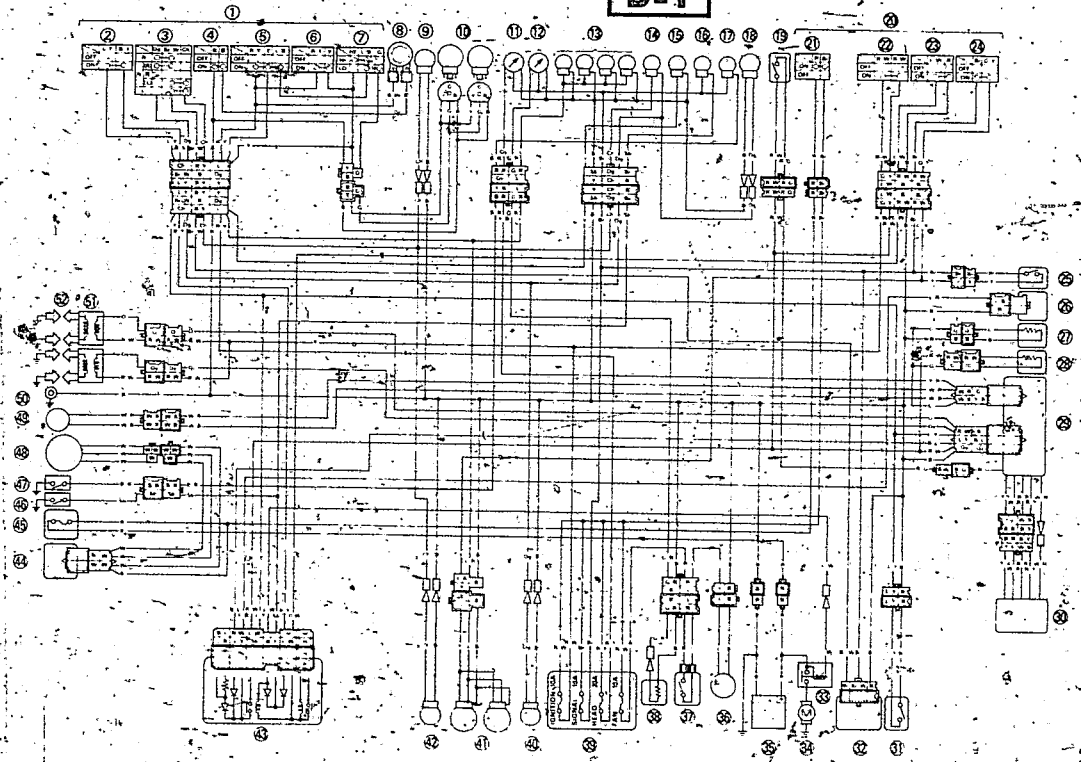


OUT OF SPECIFICATION

Wiring circuit from main switch to bulb socket connector is faulty, repair.

FZR400RR WIRING DIAGRAM (For GB)

D-1



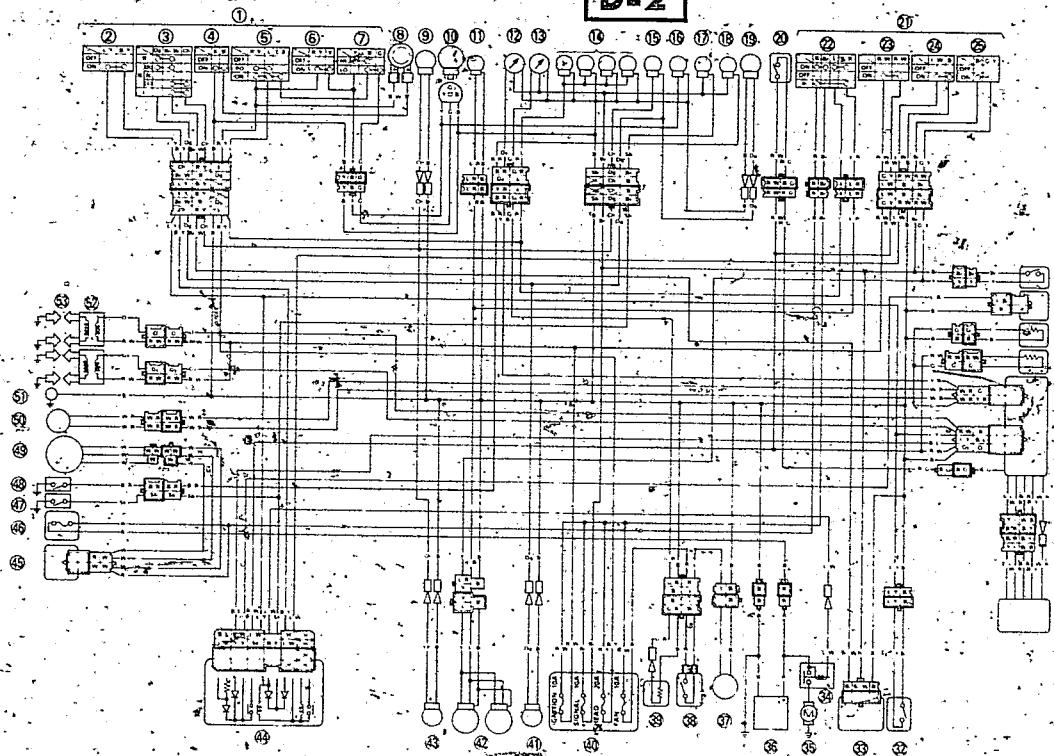
- ① Handlebar switch (left)
- ② Clutch switch
- ③ "TURN" signal switch
- ④ "HORN" switch
- ⑤ "LIGHTS" switch
- ⑥ "PASS" switch
- ⑦ "LIGHTS" (Dimmer) switch
- ⑧ Horn
- ⑨ Front flasher light (left)
- ⑩ Headlight
- ⑪ Tachometer
- ⑫ Engine temperature gauge
- ⑬ Meter light
- ⑭ "TURN" indicator light
- ⑮ "HIGH BEAM" indicator light
- ⑯ "NEUTRAL" indicator light
- ⑰ "OIL" warning indicator light
- ⑱ Front flasher light (right)
- ⑲ Reserve switch
- ⑳ Handlebar switch (right)
- ㉑ Main switch
- ㉒ "ENGINE STOP" switch
- ㉓ "START" switch
- ㉔ Front brake switch
- ㉕ Rear brake switch
- ㉖ Fuel pump
- ㉗ Fuel sender
- ㉘ Resistor
- ㉙ Ignitor unit
- ㉚ Ex-up
- ㉛ Sidestand switch
- ㉜ Flasher relay
- ㉝ Starter relay
- ㉞ Starter motor
- ㉟ Battery
- ㊱ Fan motor
- ㊲ Thermo switch
- ㊳ Thermo unit
- ㊴ Fuse box
- ㊵ Rear flasher light (right)
- ㊶ Tail/brake light
- ㊷ Rear flasher light (left)
- ㊸ Relay
- ㊹ Rectifier/Regulator
- ㊺ Main fuse
- ㊻ Neutral switch
- ㊼ Oil pressure switch
- ㊽ A.C. magneto
- ㊾ Pickup coil
- ㊿ Frame earth
- ① Ignition coil
- ② Spark plug

COLOR CODE

B	Black	B/Y	Black/Yellow
Br	Brown	Br/W	Brown/White
Ch	Chocolate	G/R	Green/Red
Dg	Dark green	G/Y	Green/Yellow
G	Green	L/B	Blue/Black
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R	Red	R/W	Red/White
Sb	Sky blue	R/Y	Red/Yellow
W	White	W/B	White/Black
Y	Yellow	W/R	White/Red
B/L	Black/Blue	Y/B	Yellow/Black
B/R	Black/Red	Y/L	Yellow/Blue
B/W	Black/White		

FZR400RR WIRING DIAGRAM (For F)

D-2



- ① Handlebar switch (left)
- ② Clutch switch
- ③ "TURN" signal switch
- ④ "HORN" switch
- ⑤ "LIGHTS" switch
- ⑥ "PASS" switch
- ⑦ "LIGHTS" (Dimmer) switch
- ⑧ Horn
- ⑨ Front flasher light (left)
- ⑩ Headlight
- ⑪ Auxiliary light
- ⑫ Tachometer
- ⑬ Engine temperature gauge
- ⑭ Meter light
- ⑮ "TURN" indicator light
- ⑯ "HIGH BEAM" indicator light
- ⑰ "NEUTRAL" indicator light
- ⑱ "OIL" warning indicator light
- ⑲ Front flasher light (right)
- ⑳ Reserve switch
- ㉑ Handlebar switch (right)
- ㉒ Main switch
- ㉓ "ENGINE STOP" switch
- ㉔ "START" switch
- ㉕ Front brake switch
- ㉖ Rear brake switch
- ㉗ Fuel pump
- ㉘ Fuel sender
- ㉙ Resistor
- ㉚ Ignitor unit
- ㉛ Ex-up
- ㉜ Sidestand switch
- ㉝ Flasher relay
- ㉞ Starter relay
- ㉟ Starter motor
- ㊱ Battery
- ㊲ Fan motor
- ㊳ Thermo switch
- ㊴ Thermo unit
- ㊵ Fuse box
- ㊶ Rear flasher light (right)
- ㊷ Tail brake light
- ㊸ Rear flasher light (left)
- ㊹ Relay
- ㊺ Rectifier/Regulator
- ㊻ Main fuse
- ㊼ Neutral switch
- ㊽ Oil pressure switch
- ㊾ A.C. magneto
- ㊿ Pickup coil
- ① Frame earth
- ② Ignition coil
- ③ Spark plug

COLOR CODE

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L	Blue	L/Y	Blue/Yellow
O	Orange	L/R	Blue/Red
R	Red	R/G	Red/Green
Sb	Sky blue	R/W	Red/White
W	White	R/Y	Red/Yellow
Y	Yellow	W/B	White/Black
B/L	Black/Blue	W/R	White/Red
B/R	Black/Red	Y/B	Yellow/Black
B/W	Black/White	Y/L	Yellow/Blue