

CLUTCH/GEARSHIFT LINKAGE

TOOLS

Clutch center holder	07724-0050002	Equivalent commercially available
Driver	07749-0010000	
Attachment, 37 × 40 mm	07746-0010200	
Attachment, 42 × 47 mm	07746-0010300	
Pilot, 35 mm	07746-0040800	

TROUBLESHOOTING

Clutch lever too hard to pull in

- Damaged clutch lifter mechanism
- Faulty clutch lifter bearing
- Clutch lifter piece installed improperly

Clutch slips when accelerating

- Worn clutch disc
- Weak clutch springs
- Transmission oil mixed with molybdenum or graphite additive

Clutch will not disengage or motorcycle creeps with clutch disengaged

- Clutch plate warped
- Loose clutch lock nut
- Oil level too high
- Improper oil viscosity
- Damaged clutch lifter mechanism
- Clutch lifter piece installed improperly

Hard to shift

- Improper clutch operation
- Improper oil viscosity
- Bent shift fork
- Bent shift fork shaft
- Bent fork claw
- Damaged shift drum cam groove
- Loose stopper plate bolt
- Damaged stopper plate and pin
- Damaged gearshift spindle

Transmission jumps out of gear

- Worn shift drum stopper arm
- Weak or broken shift arm return spring
- Loose stopper plate bolt
- Bent shift fork shaft
- Damaged shift drum cam groove
- Damaged or bent shift forks
- Worn gear engagement dogs or slots

Gearshift pedal will not return

- Weak or broken gearshift spindle return spring
- Bent gearshift spindle

ITEM	CLUTCH	GEARSHIFT
Clutch lever free play	10 - 20 (3/8 - 1/2 in)	
Clutch spring free length	57.4 (2.26)	
Clutch disc thickness	3.75 - 3.88 (0.148 - 0.153)	Blue color
Clutch plate warpage	3.75 - 3.88 (0.148 - 0.153)	Brown color
Clutch outer guide	I.D.	
Shift fork O.D. of clutch outer guide	38.000 - 38.021 (1.5024 - 1.5047)	O.D.
Shift fork fork	34.978 - 34.991 (1.3770 - 1.3776)	I.D.
Shift fork shaft	57.988 - 57.992 (2.2831 - 2.2833)	Gear thickness
Fork shaft O.D.	11.987 - 11.988 (0.4707 - 0.4712)	
Clutch center lock nut	157 N·m (113.0 kgf-m, 84 lbf-ft)	
Clutch spring bolt/washer	12 N·m (1.2 kgf-m, 8 lbf-ft)	
Right crankcase cover SH bolt	12 N·m (1.2 kgf-m, 8 lbf-ft)	
Right crankcase cover center bolt	12 N·m (1.2 kgf-m, 8 lbf-ft)	
Shift drum center socket bolt	23 N·m (2.3 kgf-m, 17 lbf-ft)	
Shift drum stopper pivot bolt	12 N·m (1.2 kgf-m, 8 lbf-ft)	
Gearshift return spring pin	23 N·m (2.3 kgf-m, 17 lbf-ft)	
Gearshift drum bearing set plate flange pin	12 N·m (1.2 kgf-m, 8 lbf-ft)	
Gearshift pedal bolt	10 N·m (1.0 kgf-m, 7 lbf-ft)	
Oil pump driven sprocket bolt	18 N·m (1.8 kgf-m, 13 lbf-ft)	

TORQUE VALUES