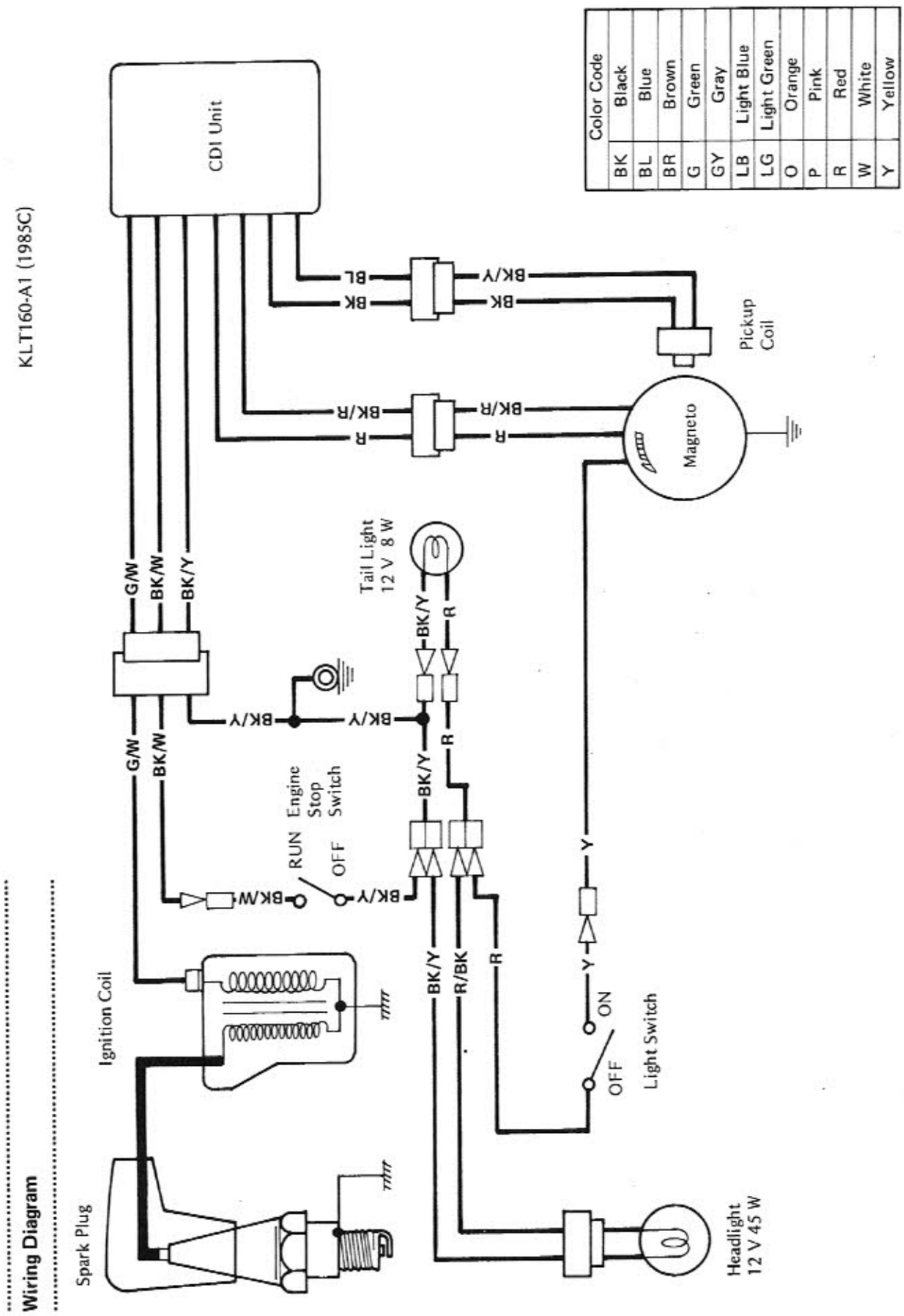
Wiring Diagram



Specifications

Ignition System:

Item	Standard
Ignition Timing	10° @1,350 r/min (rpm) 35° @4,600 r/min (rpm)
Ignition Coil:	
Arcing Distance	7 mm or more
Primary Winding Resistance	0.18 – 0.28 Ω
Secondary Winding Resistance	3.2 – 4.8 kΩ
Spark Plug: Type	D8EA (US) DR8ES (CAN)
Gap	0.6 – 0.7 mm
Exciter Coil Resistance	100 – 190 Ω
Pickup Coil Resistance	90 – 160 Ω
Pickup Coil Air Gap	0.7 ±0.25 mm

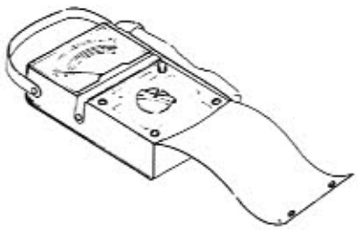
Lighting System:

Item	Standard
AC Lighting Voltage/3,000 r/min	11.5 V or more
Lighting Coil Resistance	0.8 – 1.5 Ω

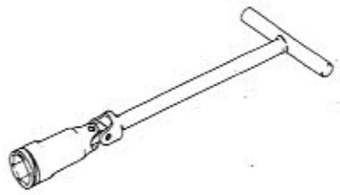
Special Tools

Along with common hand tools, the following more specialized tools are required for complete electrical system servicing.

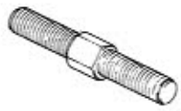
Hand Tester 57001-983



Spark Plug Wrench 57001-1024



Rotor Puller 57001-1099



Flywheel Puller 57001-1191

(9) to obtain the lowest smooth idle setting. After adjusting carburetor idle setting, check throttle lever free play as outlined in previous paragraph.

When servicing the carburetor, note the following: Jet needle clip (5) should be located in fourth groove from top of jet needle (6). Float height (A—Fig. K4-6) should be 33.3 mm (1.31 in.) as measured from gasket surface of carburetor body to lowest edge of float. Adjust the float level by bending tang (B) on float arm.

The fuel level is checked with the carburetor installed and vehicle operational. To check fuel level, attach a suitable clear hose (H—Fig. K4-7) to fuel overflow fitting (F). Hose should be of sufficient length to extend above the bottom edge of carburetor body without kinking the hose. Open the float bowl drain screw (19) approximately two turns. Run the engine at idle speed until fuel level in hose stabilizes, then stop engine. Measure the distance from the bottom edge of carburetor body (float bowl contact surface) to fuel level in hose to determine fuel level as shown at (L). Fuel level check will not be accurate if hose is raised or lowered after fuel level has stabilized. Fuel level (L) should be 5 mm (0.2 in.). To adjust fuel level, the float bowl must be removed to carefully bend float arm tang (B—Fig. K4-6).

FUEL STRAINER. On KLF185 models, an inline fuel filter located between the fuel tank and fuel pump is used. On KLT160 and KLT185 models, a strainer is mounted on the end of the "ON" pickup tube and the "RES" (reserve) pickup tube of the fuel valve assembly mounted on the fuel tank. A strainer is also located behind the fuel valve control lever. To inspect the strainers, the fuel in the fuel tank must be drained. Disconnect the fuel hose from the fuel valve. Unscrew the two screws securing the fuel valve to the fuel tank and carefully remove the fuel valve from the tank. Clean and inspect the strainers. The strainers are not available separately, only as a part of the valve housing. Reinstall the valve assembly while noting that nylon washers are used on the two retaining screws to prevent fuel leakage.

FUEL PUMP. The KLF185 model is equipped with a diaphragm type fuel pump located below the air cleaner assembly and adjacent to the front of the differential drive shaft. Fuel pump is electrically operated.

The fuel pump should produce 7-15 kPa (1.0-2.1 psi) of pressure when checked at the carburetor inlet. After the fuel pump is turned off, the pressure should stay within the specified range for at least one minute.

If fuel delivery to carburetor is interrupted, first eliminate other sources of difficulty such as insufficient fuel, clogged fuel filter, no electrical supply to fuel pump or damaged fuel hoses before renewing fuel pump. The fuel pump must be renewed as a complete unit. No service parts are available.

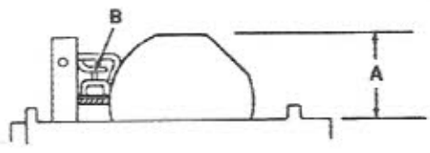


Fig. K4-6—Float height is measured at (A). Gently bend float arm tang (B) to adjust. Float height (A) should be 33.3 mm (1.31 in.).

IGNITION AND ELECTRICAL

All Models

SPARK PLUG. Standard spark plug is NGK D8EA. Spark plug electrode gap should be 0.6-0.7 mm (0.024-0.027 in.). Spark plug should be removed, cleaned and electrode gap set after the first 10 hours of operation and every 90 days of operation thereafter. Renew spark plug if damage and excessive electrode wear is evident.

IGNITION. A breakerless Capacitor Discharge Ignition (CDI) system is used. The electronic ignition circuit consists of the CDI module, pickup coil, exciter coil, flywheel, ignition coil, spark plug, engine stop switch and ignition switch. Ignition timing at idle speed should occur when "F" mark (F—Fig. K4-10) on flywheel is aligned with pointer (P) as viewed through timing plug opening. Specified ignition timing is 10 degrees BTDC ("F" mark) at 1350 rpm on KLT160 models and 1300 rpm on KLT185 and KLF185 models and 35 degrees BTDC (maximum advance) at 4600 rpm on KLT160 models and 30 degrees BTDC (maximum advance) at 4600 rpm on KLT185 and KLF185 models. Ignition timing is

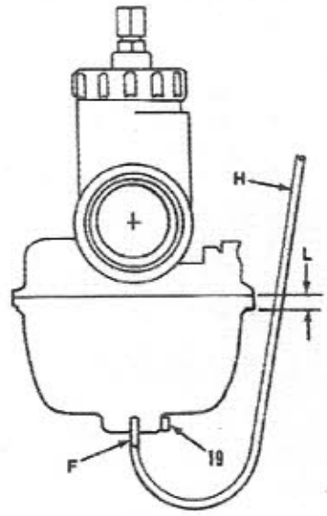


Fig. K4-7—The fuel level (L) is measured from the bottom edge of carburetor body. Refer to text.