



INSTALLATION INSTRUCTIONS

**COMPU-FIRE® HIGH PERFORMANCE VOLTAGE REGULATOR
FOR HARLEY DAVIDSON® AND AFTERMARKET MOTORCYCLES**

Part # 55120 32 Amp Black, OEM #74519-88A, 1989-1999 Big Twins

Part # 55121 22 Amp Black, OEM #74516-86, 1981-1988 Big Twins

Part # 55125 22 Amp Black, 1991-1999 Sportsters

Part # 55130 32 Amp Chrome, OEM #74519-88A, 1989-1999 Big Twins

**READ THESE INSTRUCTIONS COMPLETELY BEFORE BEGINNING
INSTALLATION!**

Check the contents of the kit:

Compu-Fire Regulator

#10 Insulated Ring Lug Terminal

¼" Uninsulated Ring Lug Terminal

5/16" – 3/8" Uninsulated Ring Lug Terminal

NOTE: REFER TO THE FACTORY SHOP MANUAL ELECTRICAL SECTION FOR SAFETY INSTRUCTIONS PRIOR TO PERFORMING ANY ELECTRICAL SYSTEM REPAIRS OR MODIFICATIONS!

CAUTION! ALWAYS DISCONNECT THE BATTERY CABLES BEFORE PERFORMING ANY ELECTRICAL SYSTEM REPAIRS OR MODIFICATIONS. THIS WILL PREVENT DAMAGE TO THE ELECTRICAL SYSTEM OR COMPONENTS IN CASE OF AN ELECTRICAL ARC CAUSED BY SHORTING THE BATTERY POWER TO GROUND.

WARNING! SEVERE DAMAGE TO THE ELECTRICAL SYSTEM OR PERSONAL INJURY MAY OCCUR BY NOT FOLLOWING THE ABOVE SAFETY INSTRUCTIONS.

REMOVAL:

1. Disconnect the cables at the battery. Remove the ground (-) cable first and then the positive (+) cable.
2. See drawing (Figure 1) to verify correct wire harness for application.

3. Measure output lead of original regulator. Cut output lead on Compu-Fire Regulator to same length. Strip wire and crimp #10 insulated ring terminal to wire. **NOTE:** Crimp must be tight for reliable charging.
4. Install Compu-Fire Voltage Regulator using original hardware. **NOTE:** Regulator must be mounted in area with good air flow.

NOTE: COMPU-FIRE REGULATOR GROUND WIRE MUST BE CONNECTED TO SOLID ENGINE GROUND FOR CORRECT OPERATION.

5. Locate suitable engine grounding point. Select proper size uninsulated ring terminal from hardware kit. **NOTE:** Crimp must be tight for reliable charging.
6. Plug in connector to stator. **NOTE:** Stator connector must plug in tightly for proper charging operation.
7. Connect output terminal to the AUX (silver) terminal on the 30 Amp main circuit breaker.
8. Connect battery ground cable.

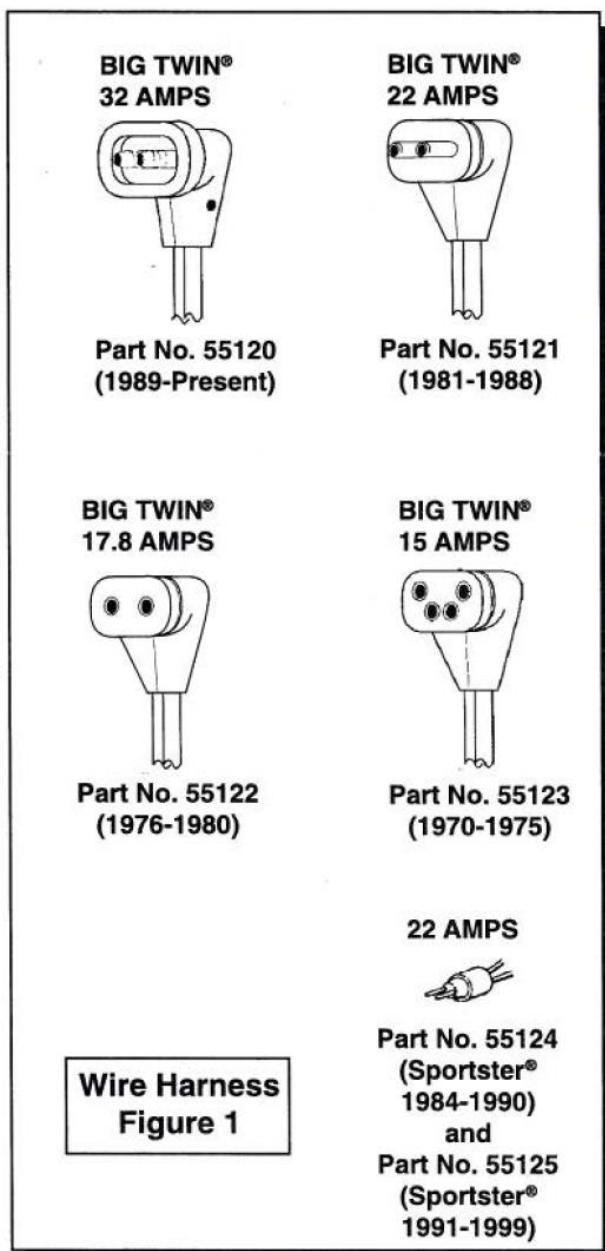
TROUBLE SHOOTING

Stator

1. The stator has 2 Pins, the pins should have continuity to each other, but the pins should **NOT** have continuity to ground.
2. With a volt meter on AC volts, the stator should be putting out 14 volts per 1,000 RPM. (Check at 1,000 and 3,000 RPM)
3. If all this test out properly your installation of the stator was successful.

Regulator

1. Do not use test procedure found in the factory shop manual. The Compu-Fire voltage regulator uses high efficiency series circuitry. The electronic circuitry is completely different.
2. With the main switch OFF, measure the voltage from the regulator output terminal (AUX silver terminal) to ground. The reading should be 12 - 13 volts. If there is no voltage reading, the battery is disconnected.
3. Start the engine and bring the RPM to 1500. The voltage should rise 1/2 to 1 volt. This indicates that the voltage regulator is charging. This completes the test.



For technical assistance call 909/547-9058

**PerTronix, LLC.
440 E. Arrow Hwy.
San Dimas, CA 91773**



LIMITED WARRANTY

PerTronix, LLC. Warrants to the original Purchaser of its solid-state ignition system (product) that the module, trigger rotor and wiring (components) shall be free from defects in material and workmanship for a period of (12) months from the date of purchase.

If within the period of the foregoing warranty PerTronix finds, after inspection, that the product or any component thereof is defective, PerTronix will, at its option, repair such products or component or replace them with identical or similar parts PROVIDED that within such period Purchaser Promptly Notifies PerTronix, in writing, of such defects.