

# INSTALLATION/TROUBLESHOOTING GUIDE

CDI P/N: 273-4981RS

This stator replaces P/N: 584981 for Racing Applications.

**WARNING!** This product is designed to be installed by a professional marine mechanic. CDI Electronics cannot be held liable for injury or damage resulting from improper installation, abuse, neglect or misuse of this product.

**SERVICE NOTE**: Discoloration of all the battery windings is an indication of a problem in the rectifier/regulator. Discoloration of only one post of the battery windings indicates a problem in the stator.

#### Installation

- 1. Remove the negative battery cable.
- 2. Remove the regulator/rectifier, power pack and timing covers.
- 3. Disconnect the timing sensor.
- 4. Disconnect the stator leads from the power pack and regulator/rectifier.
- 5. Carefully disconnect and remove the throttle linkage connected to the flywheel cover.
- 6. Remove the flywheel cover. Watch for the bendix washers and do not lose them.
- 7. Unbolt the flywheel.
- 8. Using the correct flywheel puller, remove the flywheel.
- 9. Disconnect the original stator plug from the power pack.
- 10. Remove the original stator, saving the original bolts.
- 11. Install the new stator using the original bolts with a good thread-locker applied (CDI 989-3977 is recommended) to the bolts and tightened to the factory torque specifications.
- 12. Connect the new stator to the power pack and regulator/rectifier.
- 13. Replace the flywheel according to the service manual, using new bolts (BRP P/N: 336135) in the hub.
- 14. Replace the flywheel cover. Be sure the bendix washers are in place and that the bendix does not need lubricating.
- 15. Carefully connect the throttle linkage connected to the flywheel cover.
- 16. Connect the timing sensor.
- 17. Verify the ignition timing and reset according to the service manual.
- 18. Replace the battery cable.

### **Troubleshooting**

#### No fire at all:

- 1. Disconnect the 5 wire harness connector from the power pack, if the engine now fires the kill circuit or harness is likely bad.
- Check resistance for the 2 sets of brown wires. Brown to Brown/Yellow and Brown/White to Brown/Black should read
  approximately 550 ohms for one set. DVA (peak voltage) should be 150v or more on each set while connected to the power
  pack.
- Orange to orange/black should read about 55 ohms. DVA (peak voltage) should be 15V or more while connected to the power pack.
- 4. Inspect the flywheel outer and trigger magnets to see if they are loose or broken.
- 5. Disconnect the rectifier/regulator and retest. If the fire returns, replace the rectifier/regulator.

## No fire on one bank:

Check resistance for the 2 sets of brown wires. Brown to Brown/Yellow and Brown/White to Brown/Black should read approximately 550 ohms for one set. DVA (peak voltage) should be 150v or more on each set while connected to the power pack.

## High speed miss or weak hole shot:

- 1. Connect DVA meter to each set of brown wires and do a running test. AT NO TIME SHOULD THE VOLTAGE EXCEED 400v. If it does, the regulator circuit in the power pack is bad. The voltage should show a smooth climb and stabilize, gradually falling off at high RPM (above 5000). If you see a sudden drop in voltage right before the miss becomes apparent, swap stator leads to see if the problem is in the stator or power pack.
- 2. Disconnect rectifier/regulator and retest. If the problem disappears, replace the rectifier/regulator and retest.

#### **Quick Start Does Not Work:**

- 1. Check the resistance from the Orange to the Orange/Black wires. You should read about 55 ohms.
- 2. Check DVA voltage from the Orange to the Orange/Black wires while connected to the power pack. The reading should be between 8 and 24V. A reading above 24V indicates a problem in the power pack while a reading below 8 volts usually indicates a problem in the stator.

Thank you for using CDI Electronics. 1/31/2007