OBI Integrated Helm Control for Hydraulic Systems

Also known as All-in-one Indicator Control





Troubleshooting Steps

If you have followed the complete instructions and the system is not functioning properly, please try the following trobleshooting steps. It is also recommended that you contact your marine dealer service department or email our service department at BMI_Info@Yamaha-Motor.com.

Problem: OBI unit does not show any lights and buttons are non-functional

- Cause: 18AWG Orange wire is not connected to power the source. This wire can be used with an accessory switch to shut the unit off.
 When the power to the Orange 18AWG wire is removed the Automatic Tab Retraction feature will not work because the unit is now
 powered OFF
- Cause: 18AWG Purple wire not connected to a power source. This wire needs to be connected to ignition power for the tabs to auto retract. After an auto retraction cycle, the unit will be powered off until power is supplied to both the Orange & Purple 18AWG wires
- Cause: 14AWG Orange wire not connected to power source. This wire supplies power to the pump, but the unit will not function without power to this line.
- Cause: 14AWG Black wire not connected to battery ground. This wire supplies the ground for the control, but not the ground for the pump. The black wire on the OBI control and the HPU must both be connected to ground for the system to function properly.

Problem: OBI unit shows lights, but the tabs are not moving or not moving correctly

- Cause: 14AWG Black wire from the HPU is not connected to battery ground. The black wire on the OBI control and the HPU must both be connected to ground for the system to function properly.
- Cause: The Red-Green-Yellow-Blue wire harness from the OBI Control is not connected to the HPU. Verify the connection between the OBI control and the wire harness as well as the connection between the wire harness and the pump.
- Cause: Wire harness was butt-spliced incorrectly. Verify that all connections are red to red, Green to Green, Yellow to Yellow and Blue to Blue. If you are using a pump other than a Bennett Marine pump, please contact Bennett Marine technical support for additional help.
- Cause: The pump connector may be corroded and making a poor connection. Verify the connector is in good condition. Replace the connector or eliminate the connector and butt splice the HPU to the Red-Green-Yellow-Blue wire harness.

Problem: OBI unit has all of the red lights flashing

• Cause: The OBI control is not calibrated. OBI Controls need to read the sensors that are internal to the actuators to know the trim tab position. The OBI must be calibrated for the actuator sensors that are on the particular vessel that the OBI control is installed on. See the calibration instructions

Problem: OBI unit will not display the trim tab position

- Cause: The OBI control is not calibrated. OBI Controls need to read the sensors that are internal to the actuators to know the trim tab position. The OBI must be calibrated for the actuator sensors that are on the particular vessel that the OBI control is installed on. See the calibration instructions
- Cause: The OBI control does not have the sensors connected. If the actuator sensors are not connected the upper yellow LEDs on the control will be flashing on the side where the actuator is not connected. OBI Controls need to read the sensors that are internal to the actuators to know the trim tab position. Verify that sensor connections between the OBI and the Sensors extension cables and between the sensor extension cables and the actuator cable. The OBI must be calibrated for the actuator sensors that are on the particular vessel that the OBI control is installed on. See the calibration instructions

Problem: Trim tabs do not automatically retract when the ignition is turned off

- Cause: 18AWG Orange wire not connected to power source. This wire can be used with an accessory switch to shut the unit off.
 When after power to the Orange 18AWG wire is removed the Automatic Tab Retraction feature will not work because the unit is now
 powered OFF
- Cause: 18AWG Purple wire not connected to the ignition power source. This wire needs to be connected to ignition power for the tabs to auto retract. After an auto retraction cycle, the unit will be powered off until power is supplied to both the Orange & Purple 18AWG wires

Problem: Tabs display indication does not move when buttons are pressed

• Cause: The sensor wires may be connected backwards. The OBI control expects to see actuator movement when the control is activated. If the sensor wires are backwards the OBI control will not detect movement in the actuator that is moving.

Problem: Full Tab Up and Full Tab Down do not function properly

• Cause: The sensor wires may be connected backwards. The OBI control expects to see actuator movement when the control is activated. If the sensor wires are backwards the OBI control will not detect movement in the actuator that is moving.

Problem: The actuator position is not displayed on the side that the operator is used to.

• Cause: Bennett Marine always displays the actuator position on the side that the actuator is physically located on. To move the Port Tab, the buttons on the right side of the control should be pressed. This will cause the lights on the Port (left) side of the display to move. If the operator wishes to invert the side of the position display, the operator can do this by pressing the Moon Button and the Right (Stbd) Bow Down Buttons at the same time. To reset the display to the default mode, press the Moon Button and the Left (Port) Bow Down Button at the same time

Problem: The actuators do not fully retract when the ignition is turned off

• Cause: The default automatic run time for an OBI Control is 15 seconds. System with multiple actuators or long tubing runs may need additional retraction time. The unit can be set to a 30 second retraction time by pressing the Moon Button and the Left (Port) Bow UP Buttons at the same time. To reset to the 15 second automatic retraction time, press the Moon Button and the Right (Stbd) Bow UP Button at the same time.