

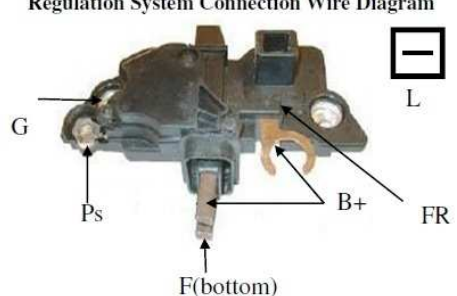
Which Regulator Will You Choose?

There have been many times throughout our industry when OEM updates a component, will change the OE number and we later learn that this component's performance is the same as the earlier item. Then there have been times when OE uses the same appearance as in a housing assembly, but they modify the circuit and that new circuit will replace the earlier item but the earlier item will not work in place of the later design. We have also seen where the item could look the same, but the component will not interchange. Case in point, we have all three listed below. The first design on this Bosch regulator for the Volvo was Lamp activation, and the regulator was an "A" circuit design. Then along came the second generation, and the regulator went to a "B" circuit, but kept Lamp activation.

Both will interchange on the alternator and on the vehicle, but we advise using the second generation regulator even for the first design vehicles. The only large difference is in the testing of regulator outside of the alternator, and how to connect to said regulators.

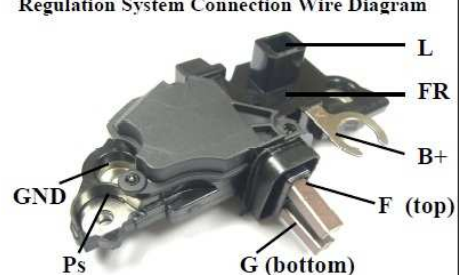
Then in mid-year 2004 Volvo went to the LIN circuit but kept the old housing design. Testing the LIN circuit requires a tester that communicates in digital signal. No conventional testers from years past will test this regulator. This article is not written for testing these regulators but as a reference guide and to be cautious when you're confronted with these units.

NAME	VRB221 Electrical Specification		
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<p>Regulation System Connection Wire Diagram</p>  <p>Labels: G, Ps, F(bottom), B+, FR, L</p>	<p>System Regulator Type:</p> <ul style="list-style-type: none"> ● Voltage Set Point :14.4V ● Regulation : A – Circuit ● Active Lamp ● Soft Start, 8.5 sec LRC ● Short Circuit Protection
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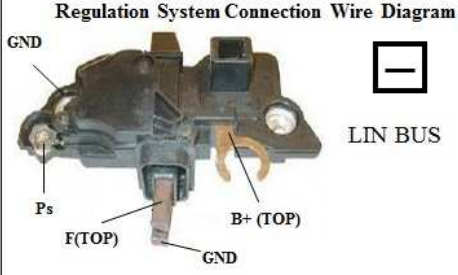
OE Regulator #
F00M145208
F00M145229
F00M145230
F00M145351
Lester #13802, 13997
Regitar # VRB221

NAME	VRB369 Electrical Specification		
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<p>Regulation System Connection Wire Diagram</p>  <p>Labels: L, FR, B+, F (top), GND, Ps, G (bottom)</p>	<p>System Regulator Type:</p> <ul style="list-style-type: none"> ● Voltage Set Point :14.6V ● Regulation : B – Circuit ● Active Lamp ● Soft Start , 5sec LRC ● Short Circuit Protection ● FR : Connect to computer
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OE Regulator #
F00M145279
F00M145369
F00MA45211
Lester # 11081, 11082, 13801,
13998
Regitar # VRB369

NAME	VRB379 Electrical Specification		
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<p>Regulation System Connection Wire Diagram</p>  <p>Labels: GND, Ps, F(TOP), B+ (TOP), GND, LIN BUS</p>	<p>Regulator Features :</p> <ul style="list-style-type: none"> ● Stand by mode ● Leakage current control ● Self mode ● Default mode ● LIN (Com) mode ● Variable V setting ● Field out duty monitor ● Temperature & Field current ● Regulation : B – Circuit
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OE Regulator #
F00M145311
F00M145379
F00MA45212
Lester # 11091, 11363, 11488
Regitar # VRB379
Use with # COM01 Tester

To learn more about the LIN Bus communication system, please go to our website (www.regitar.com) and click “Flyers” to see our latest presentation “Regulators of Today and Tomorrow”.