



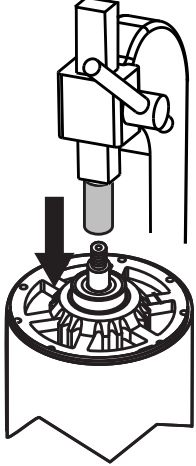
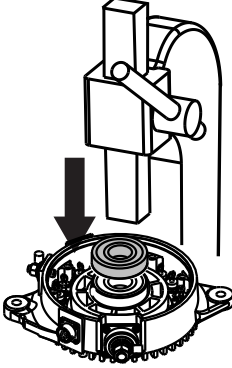
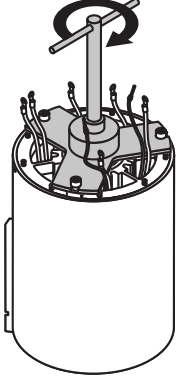
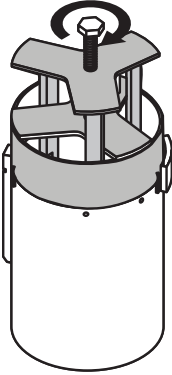
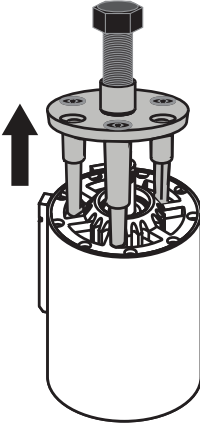
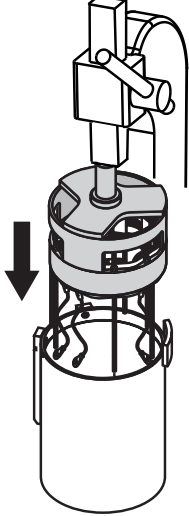
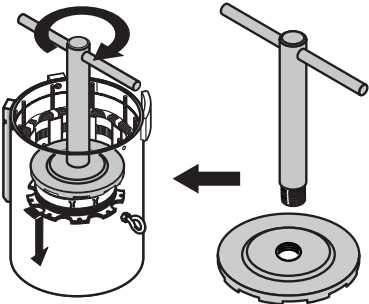
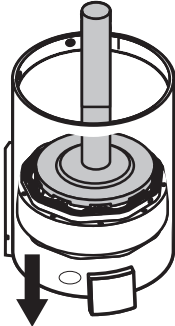
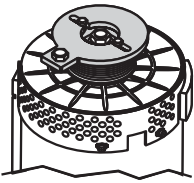
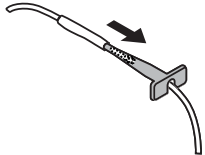
Service Tools for CEN Alternators

Use this guide as a general reference. To find the CEN service tool for your CEN alternator, refer to the model-specific Service Manual. Tools listed may be ordered through factory authorized CEN Warehouse Distributors and Service Distributors. CEN Warehouse Distributor and Service Distributor locations can be found at www.ceniehoff.com.

Bearing Removal / Insertion		500s	600s	700s	800s	Stator Insertion		500s	600s	700s	800s	
A10-102 Bearing Tool OD: 22.1 mm/0.87 in. ID: 17.4 mm/0.69 in.		●	●	●	●	A10-120 Stator Insertion Tool OD: 165.1 mm/6.5 in.		●				
A10-109 Bearing Tool OD: 38.1 mm/1.5 in. ID: 32.5 mm/1.28 in.		●	●	●	●			A10-136 Stator Insertion Tool (Includes six A9-814 insertion studs) OD: 184.2 mm/7.25 in.		●	●	
A10-155 Bearing Tool OD: 49.5 mm/1.95 in. ID: 34.8 mm/1.37 in.					●			A10-137 Stator Insertion Tool (Includes six A9-846 insertion studs) OD: 209 mm/8.25 in.				●
A10-158 Bearing Tool OD: 25.4 mm/1.0 in. ID: 19.1 mm/0.75 in.		●				Housing Removal						
A10-108 Bearing Tool OD: 69.9 mm/2.75 in. ID: 15.9 mm/0.63 in.		●	●	●	●	A10-131 ADE Housing Removal Tool				●	●	
A10-154 Bearing Tool OD: 3.15 in. ID: 15.9 mm/0.63 in.					●	A10-133 DE Housing Removal Tool OD: 203 mm/8.0 in.			●	●		
A10-157 Bearing Tool OD: 60.3 mm/2.38 in. ID: 15.9 mm/0.63 in.		●				A10-134 DE Housing Removal Tool OD: 219 mm/8.63 in.					●	
Stator / Field Coil Removal / Insertion		500s	600s	700s	800s	A10-138 DE Housing Puller Tool		●	●	●		
A10-128 Field Coil Removal/ Insertion/Stator/ Removal Tool OD: 158.5 mm/ 6.24 in.					●	A10-138-1 Replacement Plate		●	●	●		
A10-132 Field Coil Removal/ Insertion Tool/Stator Removal Tool OD: 134.6 mm/ 5.3 in.			●	●		A10-138-2 Replacement Leg						
A10-147 Field Coil Insertion/ Removal Tool Plate OD: 123.6 mm/4.87 in.		●				A10-138-3 Replacement Bolt						
A10-149 Field Coil Insertion/ Removal Tool Plate OD: 154.9 mm/6.1 in.					●	A10-138-4 Replacement Screw						
A10-150 Tool Bar with Handle		●	●	●	●	Other		500s	600s	700s	800s	
						A10-130 Field Coil Connector Separation Tool		●	●	●		
						A10-135 Pulley Nut Torque Tool		●	●	●	●	


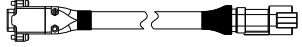
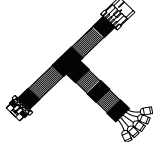
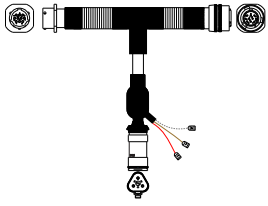
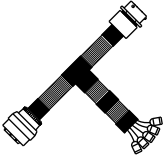
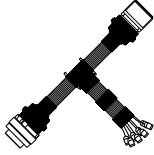
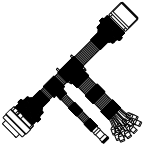
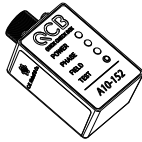
Using CEN Service Tools

CEN service tools should be used as shown below. Refer to the model-specific CEN alternator Service Manual to find the CEN service tool for your alternator and detailed instructions for tool usage. Contact the CEN Service Department if you have questions about CEN service tool usage.

<p>A10-102, A10-109, A10-155, A10-158 Use to install DE/ADE bearing onto shaft.</p> 	<p>A10-108, A10-154, A10-157 Use to install bearing into DE/ADE housing.</p> 	<p>A10-131 Use to remove ADE housing.</p> 	
<p>A10-133, A10-134 Use to remove DE housing.</p> 	<p>A10-138 Use to remove DE housing.</p> 	<p>A10-120, A10-136, A10-137 Use to install stator.</p> 	
<p>A10-128, A10-132, A10-147 OR A10-149 with A10-150 Use to remove/install field coil.</p> 	<p>A10-128, A10-132, A10-147 OR A10-149 with A10-150 Use to remove stators.</p> 	<p>A10-135 Use to install/remove pulleys.</p> 	<p>A10-130 Use to separate field coil wire connectors.</p> 

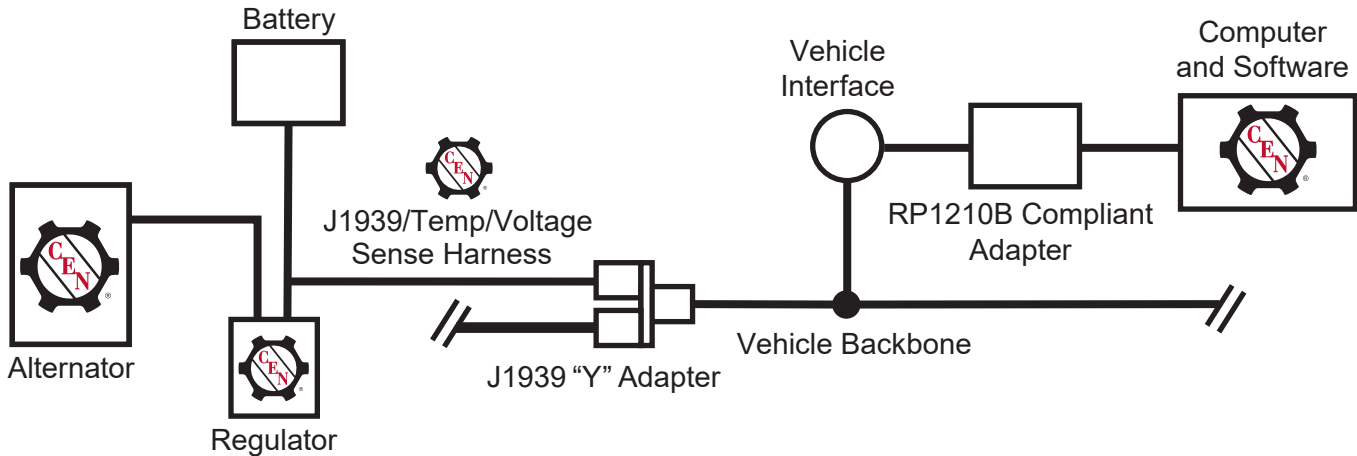
CEN Diagnostic and J1939 Tools

Refer to the model-specific CEN alternator Service Manual to find the CEN service tool for your alternator and detailed instructions for tool usage. Tools listed may be ordered through factory authorized CEN Warehouse Distributors and Service Distributors. CEN Warehouse Distributor and Service Distributor locations can be found at www.ceniehoff.com.

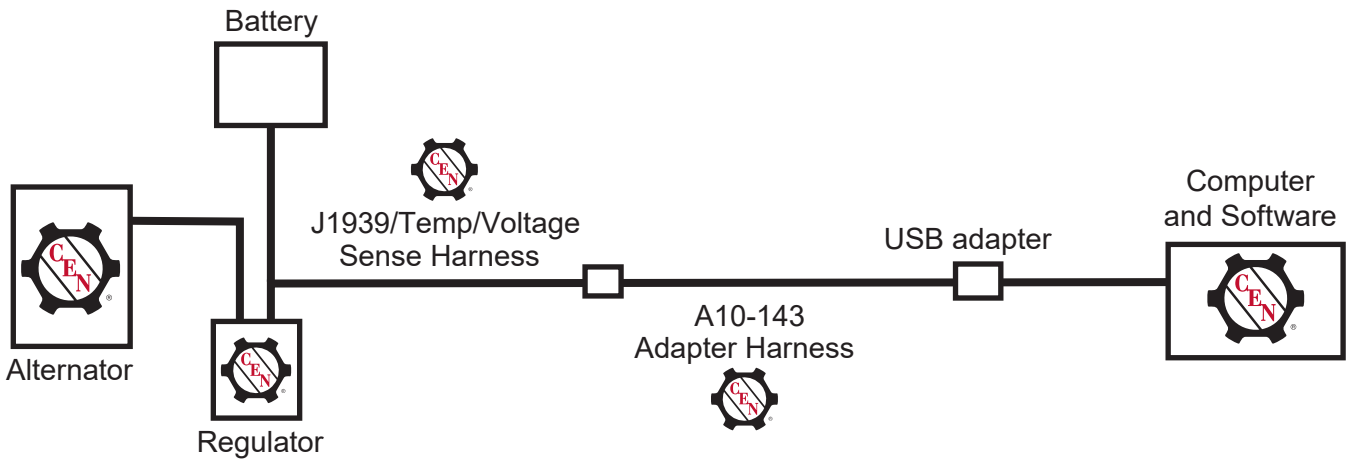
CEN DIAGNOSTIC TOOLS		500s	600s	700s	800s	CEN J1939 TOOLS		
A10-114 6-Pin In-line Harness Test Tool		●	●	●	●	A10-143 CEN CAN Adaptor Harness		
A10-115 5-Pin Metri-Pack In-line Harness Test Tool			●	●		A10-144 J1939 In-Line Harness		
A10-140 5-Pin In-line Harness Test Tool		●				CEN J1939 SOFTWARE	CONTACT CEN AFTERMARKET FOR DOWNLOAD DETAILS. See page 4 for general J1939 system block diagrams and system requirements.	
A10-151 8-Pin in line Harness Test Tool		●	●	●	●			
A10-156 18-Pin in line Harness Test Tool		Contact CEN for details on model-specific usage.						
A10-152 Quick Check Box		Contact CEN for details on model-specific usage.						
A10-153 Quick Check Box		Contact CEN for details on model-specific usage.						

J1939 System General Block Diagram

Integrated J1939 System



Stand-Alone J1939 System



System Requirements

Compatible USB adapters required for use with this software:

RP1210B compliant tested adapters recommended for vehicle data network connection:

- NexIQ® USB-Link.
- DG Tech® DPA 4+/5.

Adapters recommended for direct regulator and regulator sensing harness connection:

- PEAK-System® PCAN USB/CAN Adapter.

Cable Suggestions:

- PEAK-System® P1210 Cable Reference.
- PEAK-System® PCAN Cable Reference.
- PEAK-System® PCAN to Harness Cable Reference.

Minimum System Requirements:

- OS: Microsoft® Windows® XP Service Pack 2/Vista 7/8.
- CPU: Intel® Dual Core 1.6 GHz, AMD Dual Core 1.5 GHz.
- RAM: Microsoft® Windows® XP SP2, 1 GB; Vista™ and newer, 2 GB.

Recommended System Configuration:

- OS: Microsoft® Windows® 7/8/10.
- CPU: Intel® i5 Series or AMD X2, 1.5 GHz or greater.
- RAM: 2 GB or greater.

Intel® is a trademark of Intel Corporation

Microsoft®, Windows®, and Vista™ are trademarks of Microsoft Corporation.

NEXIQ® is a trademark of IDSC Holdings LLC.

PEAK-System® is a trademark of PEAK-System Technik GmbH.

Grid Connect® is a trademark of Grid Connect, Inc.

DG Tech® is a trademark of DG Technologies.

If you have questions about your alternator or these instructions, or if you need to locate a Factory Authorized Service Distributor, please contact us at:

C. E. Niehoff & Co. • 2021 Lee Street • Evanston, IL 60202 USA

TEL: 800.643.4633 USA and Canada • TEL: 847.866.6030 outside USA and Canada • FAX: 847.492.1242

E-mail us at service@CENiehoff.com