OCS 1.5 Sealed Connection System

ROBUST design features for enhanced warranty performance and designed-in durability

Optimal Component Series (OCS) 1.5 Sealed Connection System is engineered for enhanced warranty and reliability performance expected in today’s passenger vehicle applications.

OCS 1.5 Sealed Connection System’s compatibility with industry standard mating housing interfaces and terminal cavities enables easy integration for OEMs and their tiered suppliers.

The sealed system includes:
- Female housing
- Male housing
- Housing seal
- Plug through block cable seal
- Strain reliefs / block cable seal retainers
- Primary Lock Reinforcements (PLR)
- Optional Connector Position Assurance (CPA)
- Female terminals
- Male terminals

Typical Applications

OCS 1.5 Sealed Connection System is designed for the following markets:
- Automotive
- Transportation

Performance Specifications

<table>
<thead>
<tr>
<th>OCS 1.5 mm Sealed Series</th>
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</thead>
<tbody>
<tr>
<td>Cable range</td>
</tr>
<tr>
<td>0.13 mm² to 2.0 mm²</td>
</tr>
<tr>
<td>Temperature range</td>
</tr>
<tr>
<td>- 40° C to 125° C</td>
</tr>
<tr>
<td>Resistance</td>
</tr>
<tr>
<td>&lt; 8.0 mΩ</td>
</tr>
<tr>
<td>Voltage drop</td>
</tr>
<tr>
<td>&lt; 8.0 mV/A</td>
</tr>
<tr>
<td>Centerline spacing</td>
</tr>
<tr>
<td>3.50 mm</td>
</tr>
<tr>
<td>Blade width</td>
</tr>
<tr>
<td>1.50 mm</td>
</tr>
</tbody>
</table>

The general application guidelines above are for reference only and may not account for all variables that would be present in an actual application. For additional detailed product performance information, contact Delphi.
Availability

OCS 1.5 Sealed Connection System is released for production. Manufacturers can contact Delphi for information regarding:
• Samples
• Specifications
• Validation results
• Benchmark testing

Benefits

Housings
• Full portfolio family: 2, 3, 4, 6, 8, 10, 12, 16-way sealed hand mate female and male housings
• USCAR interface standards + 2 for 6 total indexes for expanded application flexibility
• USCAR EWCAP-002 cavity standard for easy product integration
• Field-proven housing seal design
• Punchable strain relief / cable seal retainer eliminates need for loose piece cavity plugs
• Polyester housings for enhanced audible click for operator build feedback and dimensional stability in all seasons
• USCAR clip slot

Terminals
• Tin and sliver plated female and male terminals
• Robust female terminal contact tongue over stress protection and contact nose protection
• USCAR blade standard 0.8 mm male terminal thickness
• 0.13 mm² to 2.0 mm² copper cable range
• Terminal crimps validated to SAE/USCAR-21
• Superior 6+ sigma projected terminal reliability at 150,000 miles (241,401 km) per USCAR-20 life test
• Aluminum cable compatible

OCS 1.5 Sealed Connection System is validated for 125°C on engine and transmission temperatures, on engine vibration profiles and sealed high pressure spray vehicle applications.
Exploded View of the OCS 1.5 Sealed Connector Assemblies

The Delphi Advantage

Delphi is one of the world’s top automotive suppliers of advanced terminals, connectors, sealing, wiring and cable products. Delphi’s deep understanding of various connection system technologies and the company’s vast research and development capabilities have enabled continuing innovation.

Delphi is a source for high value solutions and our expertise is built into every product. Delphi has a thorough understanding of markets around the world and a global network of resources. Delphi relies on its global capabilities, consistent processes, and extensive testing to develop and manufacture a comprehensive offering of terminals, connectors, sealing, wiring and cable products. The result is that Delphi provides customers with robust, reliable products and world-class quality.