

## NEW PRODUCTS

### CDR - SPLICE SEALING SOLUTION

The automotive industry has long used heat shrink tubing for splice sealing and environmental protection in wire harness applications. DSG-Canusa introduces CDR, the newest addition to its' splice sealing family of products. Specifically designed for rugged environments, CDR will standup to the harshest conditions.

CDR is a semi-rigid, flame retardant, adhesive lined polyolefin heat shrink that protects against corrosive automotive fluids. CDR provides a solution to the perpetual problem of fluids penetrating into wire splices. Its' inner adhesive layer creates an effective barrier which bonds to Copper, XLPE and PVC substrates. This adhesive reduces sliding with improved viscosity, allowing for easy application and durability. Abrasion protection is guaranteed through a mechanically tough outer jacket which provides excellent strain relief.

A notable characteristic of CDR, when compared to competing products, is the -40°C to 130°C operating temperature range. This extended range allows for versatility in product usage. CDR is also available in four different sizes and features a 4:1 shrink ratio, which is perfect for irregular shaped connectors.

CDR adheres to all major automotive OEM on highway / off road splice sealing specifications and is Ford and RoHS approved.

*From locomotives to off road equipment, CDR effectively covers your transportation needs.*

For more information on CDR please visit: [http://dsgcanusa.com/products/product\\_cdr.htm](http://dsgcanusa.com/products/product_cdr.htm)



## DSG-CANUSA UPDATE

### 2010 TRADESHOW SCHEDULE



#### **We enjoyed visiting with many of you at:**

IEEE (New Orleans):	April 20-22, 2010
DelMar (San Diego):	May 5-6, 2010
Wire Processing (Milwaukee):	May 12-13, 2010

#### **Please stop by and say hello at:**

CUEE (Toronto):	September 14-15, 2010
SCTE (New Orleans):	October 20-22, 2010

## DSG-CANUSA NEWS

The Bob Cardno award has been given to Ralph Dias in of his exemplary work and completion of the Quality Assurance Certificate (QAC) program. He received the award at the annual American Society for Quality's (ASQ) meeting on June 9th, 2010.

Ralph Dias has been DSG-Canusa for 25 years, and is currently a Senior Quality Assurance Inspector.

DSG-Canusa would like to congratulate Ralph Dias on his award and his outstanding achievements in Quality Assurance.



## DSG-CANUSA APPLICATIONS

### MEDIUM VOLTAGE CABLE ACCESSORIES AND SELECTION CRITERIA

Cable accessories are used extensively to insulate, seal and protect power cables from electrical shock and safety hazards during installation and normal operation.



The evolution of cable jointing and termination systems started with vinyl tape in the early 1900's and then progressively moved to use of cast resin technology followed by the introduction of Heat Shrink technology in the early 1960's. The innovation in rubber material technology and stress relief systems led to the availability of Cold Applied products covering Force fit type molded rubber and Cold shrink designs in the mid-1970's. Cold shrink terminations utilize a one-piece silicone rubber expanded part that is held over a spiral rip cord housing which unwinds easily to facilitate quick installation.

Low voltage cable accessories (0-1000V range) are simple to install and use. In this case, a single piece tube design is typically used to protect and seal the cable termination or joint, usually over a lug or crimp connector. A stringent set of qualification tests are performed

to demonstrate the product's ability to withstand way beyond the typical operating environment. The same applies to MV cable accessories (5kV-35kV range) but in this case the cable designs are much more complex which require elaborate tools and installation instructions to complete the cable joint or termination. All products are qualified to meet the stringent requirements of IEEE standard 48 or 404.

#### Product Application & Selection

DSG-Canusa offers a comprehensive range of cable accessories for application over a vast majority of commonly used polymeric and paper insulated power cables. There are two main categories of cable accessories that are typically used, i.e. heat shrinkable and cold applied and both types are available depending on the end-user preference. E.g. Electrical utilities favour the use of cold shrink terminations for connecting underground cables to the power distribution grid when using in overhead applications or in confined spaces. However the use of heat shrink technology is still preferred having a proven record of many decades of operational life and offering distinct advantages in application and performance. The use of a torch adds flexibility during cable preparation and installation of heat shrink tubes and heat activated sealant mastics.

Cable accessories can be selected based on the type of

power cables used. The cable configuration usually falls under two main application categories. Shielded Cables are typically used in Industrial / three phase systems and Concentric Neutral type cables used by Electrical Utilities for primary distribution of electricity. DSG-Canusa offers a comprehensive range of heat shrinkable and cold shrink cable accessories for both types of power cables. The G series covers shielded type, single or three conductor power cables whereas the UD series covers the concentric neutral type cables. All the necessary components are supplied as part of a kit in one box to enable installation of a cable termination or joint at the jobsite.

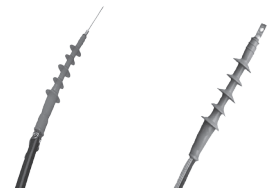
For end users preferring use of heat shrinkable cable accessories, DSG-Canusa offers the following commonly used kit configurations for extruded dielectric power cables:



1. CT G & 3G Series cable termination kits for 1/C and 3/C, copper tape or drain wire shielded power cables rated 5-35kV
2. CT UD Series cable termination kits for 1/C, bare and jacketed concentric neutral underground distribution cables rated 15-35kV

3. CJ 20, CJ 320 and CJ 3A20 Series cable joint kits for 1/C, 3/C and 3/C armored copper tape or drain wire shielded power cables rated 5-35kV
4. CJ 10 Series cable joint kits for 1/C, bare and jacketed concentric neutral underground distribution cables rated 15-35kV

For end users preferring use of cold shrink cable accessories, DSG-Canusa offers the following kit configurations for extruded dielectric power cables:



1. TITAN G Series cable termination kits for 1/C, copper tape or drain wire shielded power cables rated 5-35kV
2. TITAN UD Series cable termination kits for 1/C, bare and jacketed concentric neutral underground distribution cables rated 15-35kV
3. TITAN 3/C termination conversion kits used to convert 3/C shielded power cables to 3-1/C, 5-15kV rated cable terminations. The kits contain cold shrink re-jacketing tubes, sealants, breakout boots and grounding components as necessary.

#### QUICK\_SELECT'R Guide

Cable accessories can be selected easily based on knowing the voltage class, number of conductors and conductor size, cable type e.g. whether shielded or JCN, armored or unarmoured, and in the case of terminations whether indoor or outdoor application. DSG-Canusa offers a "Quick\_Select'r" guide that can assist end users to quickly find and select the most appropriate cable accessories based on the cable type used. The Quick\_Select'r guide is contained in the back part of the product catalogue and also available on the website.