

**FEATURED PRODUCT**

**Gladhands**

- Wrap-around connector plate provides additional strength
- Powder-coated connector plate for corrosion resistance
- Corrosion-resistant gladhands are anodized for increased protection against magnesium chloride, road salts and chemicals
- QWIK-E® is a quick release valve and gladhand combined into one



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**Winterizing Your Electrical Harness**

Wire harnesses today far surpass those of the past in quality. However, even if you have a first class harness system in place, it's practically useless unless it's protected at the front end. Without a sealed front end, corrosion and contamination will wick their way through the front of the harness, "clogging the arteries", rendering the sealed harness virtually useless.

**Sealed Front Ends**

It is essential to use a socket that is made to withstand the effects of moisture and corrosion. Today, fleets have more than one option available to them. Metal sockets are one option. They are cost effective and get the job done. However, the anti-corrosive property zinc will only succeed at helping to maintain the integrity of the actual socket housing itself, rather than the electricals within. This is because all metal sockets leak. Due to their construction, they are not a completely sealed component. So what does a fleet need to do? Start by converting metal sockets to glass filled nylon and make sure they are insert molded. Insert molding seals the pins to the housing which will prevent contamination from entering the harness system. This is your best bet at sealing out corrosion where it is most likely to begin.



**When Sealed Front Ends are Not an Option**

So what is a fleet to do when a sealed front end is not an available option, and maintenance on the electrical system is due before winter hits it's hardest? Here are some tips to follow:

- Start by disconnecting all pigtails and inserting new corrosion protective dielectric grease.
- Cable tie or secure all loose pigtails as close to the lamp as possible. You don't want to give road ice a place to buildup, which can inadvertently disconnect pigtails from the lamps.
- To protect wires from sharp edges, small grommets can be used where wire entry holes are utilized in the trailers frame. Make one cut from the outer edge to the center. Insert the wire so that it runs through the center, and attach the grommet to the frame. Another "trick of the trade" is to use a gladhand seal with a dust flap on all entry holes going to the stop tail directional lamps.
- Check for any damage to the electrical harness insulation and repair using solder and seal or heat shrink terminals to make a new connection. Consider using clear heat shrink terminals to visibly ensure a perfect connection. Where heat shrink terminals are not available, heat shrink tape is another option. Simply cut a short strip and wrap it around the defective wire. This tape cures in the air after a short time and will give a great seal.
- Properly clean all 7 way sockets and plugs using a plug and socket brush. Then apply a healthy amount of dielectric grease on all contacts

These tips will help fight corrosion during the winter season, and when combined with a sealed front end, you are almost guaranteed a weather-proof harness system.



Have technical questions? Get the latest tips from a skilled Phillips engineer! Call: 888-959-0995 OR e-mail: [techtips@phillipsind.com](mailto:techtips@phillipsind.com)

- Convert all metal sockets to glass filled nylon sealed sockets.
- Secure all pigtails as close to the lamps as possible to avoid road ice buildup.
- Apply dielectric grease to pigtails and clean 7 way socket and plug connections.
- Look for and repair any damage to the harness insulation using solder and seal or heat shrink terminals.

*\*Phillips Industries, to the best of our knowledge, has compiled the information contained herein from what it believes are authoritative sources. This information is not to be taken as representation for which Phillips Industries assumes legal responsibility.*