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PRODUCT RELEASE



Cortec® Develops Specialized Ready-to-Use Rust Preventative Ideal for Tight Tolerances!

Cortec® has an excellent record of developing products that meet specific end user needs. This is the case with Cortec's new VpCI®-277, a ready-to-use dry film rust preventative designed for preserving metals during storage and transportation.



The need for VpCI®-277 arose from a major automotive manufacturer who was using one of Cortec's VpCI® products to protect parts during temporary storage and overseas shipping. They were pleased with the protection achieved by applying a tenacious VpCI® film to the metal parts. However, they needed a rust preventative with a drier film and a low VOC that would also meet their solvent-based specification.

Cortec® R&D solved the problem by developing VpCI®-277, a rust preventative containing a biobased corrosion inhibitor in a non-flammable, low VOC solvent carrier. The product combines film-forming additives with Vapor phase Corrosion Inhibitors to provide excellent multi-metal corrosion protection. VpCI®-277 leaves a dry, non-tacky, virtually undetectable film on the metal surface. The film has many advantages:

- Ideal for robotic assembly of precision components requiring tight tolerances
- Helps maintain a clean preservation process through absence of oily residue
- Contains no chlorinated compounds, chromates, or nitrites



VpCI®-277 can provide corrosion protection for up to two years of indoor storage—or during domestic or international shipments when combined with VpCI® packaging materials.

The use of rust preventatives to preserve metals during storage and transportation has traditionally been a messy process in which greasy rust preventatives must be applied and removed—sometimes repeatedly. This is because metal work-pieces risk flash corrosion as they frequently sit in temporary storage awaiting the next step in the manufacturing or assembly process. Applying a rust preventative protects the parts but often requires an additional step of cleaning before the components can go through the next phase of the process.

An important characteristic of Cortec's innovative products is their ability to streamline processes for more efficient manufacturing, assembly, storage, or shipping. The goal is to achieve quality protection while eliminating steps, improving tact time, and reducing the use of additional materials.

With VpCI®-277, a ready-to-use rust preventative can be applied by spray or dip and left on metal parts during further processing or shipment. VpCI®-277 does not require removal by the end user because the virtually undetectable film does not interfere with use of the product in tight tolerances. This often eliminates the extra step of cleaning, significantly cutting down on labor time and expenses by enabling a more streamlined tooling, storage, and shipment process.



Cortec® is committed to providing excellent corrosion control solutions like these that add value to the customer in diverse applications around the globe. Sometimes that requires performing additional R&D to provide the right solution for the job. The development of VpCI®-277 is yet another example of how Cortec® is able to adapt technology to special end-user needs in order to provide the optimal product characteristics for a specific application.

VpCI®-277

TYPICAL APPLICATIONS
VpCI-277 is a ready-to-use product and can be applied by spraying or dipping.

TYPICAL PROPERTIES

Appearance	Clear yellow liquid
Density	8.6-8.8 (kg/L) (0.60-0.62 lb/gal)
VOC	0.03 (kg/L) (0.04 lb/gal)
Film Type	Dry clear

PACKAGING AND STORAGE
VpCI-277 is available in 5 gallon (19 liter) pails, 55 gallon (208 liter) drums, liquid tote, and bulk.
VpCI-277 should be kept from high temperatures and in normal atmospheric conditions.
VpCI-277 has a shelf life of 2 years in unopened original containers.

PRODUCT DESCRIPTION
VpCI-277 is a ready-to-use rust preventative designed for protection of metals in storage and during transportation. VpCI-277 contains a balanced corrosion inhibitor in a non-flammable, low VOC solvent carrier. Unlike traditional rust preventatives, VpCI-277 leaves a dry, virtually undetectable film on the metal surface. This feature helps to maintain a clean process. VpCI-277 can provide corrosion protection for up to 2 years of outdoor storage or during shipment in international shipments when combined with VpCI® packaging materials.

FEATURES

- Provides excellent multi-metal corrosion protection
- Contains film-forming inhibitors with Vapor phase Corrosion Inhibitors (VPCI)
- Forms dry, protective film on all surfaces
- Contains balanced corrosion inhibitors
- Contains no chlorinated compounds, alcohols, or solvents
- Low VOC and non-flammable
- Ready-to-use
- Ideal for robotic assembly of precision components requiring tight tolerances

STANDARD TEST METHODS

ASTM D1748	Humidity
ASTM D1735	Water Fog
MIL-C-83993	Selection of Rust Preventatives
ISO 9224	Atmospheric Corrosion
ISO 1554	Selection of Rust Preventatives

CORTEC CORPORATION
CORROSION CONTROL TECHNOLOGIES

VpCI®-277 conforms to ASTM D1748 (Humidity), ASTM D1735 (Water Fog), MIL-C-83993 (Water Displacement), and NACE RP0487-2000 (Selection of Rust Preventives) standard test methods.

To find out more about VpCI®-277, please visit:

<http://cortecvci.com/Publications/PDS/VpCI-277.pdf>

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