



## VpCI™ ADDITIVES FOR FORMULATORS

# VpCI®-649 BD



### PRODUCT DESCRIPTION

VpCI-649 BD is a unique, concentrated liquid formulation that protects ferrous and non-ferrous metals from corrosive solutions. In addition, this product is designed to provide long-term protection in fresh water, steam and glycol closed loop systems. VpCI-649 BD also includes preservatives against biogrowth.

VpCI-649 BD is effective as a replacement for nitrite/chromate-based formulations.

VpCI-649 BD combines contact and volatile corrosion inhibitors along with anti-scalants in a non-toxic formulation that does not contain nitrites, phosphates, chromates or heavy metals. Being environmentally safe, this product helps solve the problem of disposal, particularly for large quantities of water.

### FEATURES

- Effective for a broad range of applications to stop aggressive corrosion in systems containing fresh water, glycol coolants, etc.
- Environmentally friendly and nitrite-free
- Low concentration effectiveness provides economical treatment
- Vapor phase action provides protection to areas that contact inhibitors cannot reach
- Contains an acrylic polymer to prevent scale formation
- Readily water-soluble liquid for easy application
- Multi-metal protection
- Effective in low dosages
- Does not contain free amines
- Contains molybdate tracer (for product without molybdate order VpCI-649 BD MF)

### TYPICAL APPLICATIONS

- Inhibitor for closed loop cooling systems
- Fire extinguishing systems
- Inhibitor for hydrostatic testing of pipelines, casings, tanks and valves
- Inhibitor for packer fluid applications
- Prevents water-bottom corrosion in oil storage tanks
- Alkanolamine sweeteners
- Pulp and paper process equipment
- Mines, mining and earth moving equipment
- Inhibitor for lay-up application of cooling towers

### DOSAGE

- For operational systems such as closed loop, start at 2,500-3,000 ppm (0.25-0.3%). Additional bio dispersant may need to be added depending on the system.
- For seasonal lay-up application, (up to 6 months) use VpCI-649 BD at a concentration of 0.5% of inhibitor by volume (wet lay-up method)
- Hydrotesting concentration varies from 0.5-2% by weight depending on application
- For systems already containing molybdate please use VpCI-649 BD MF which does not contain tracer

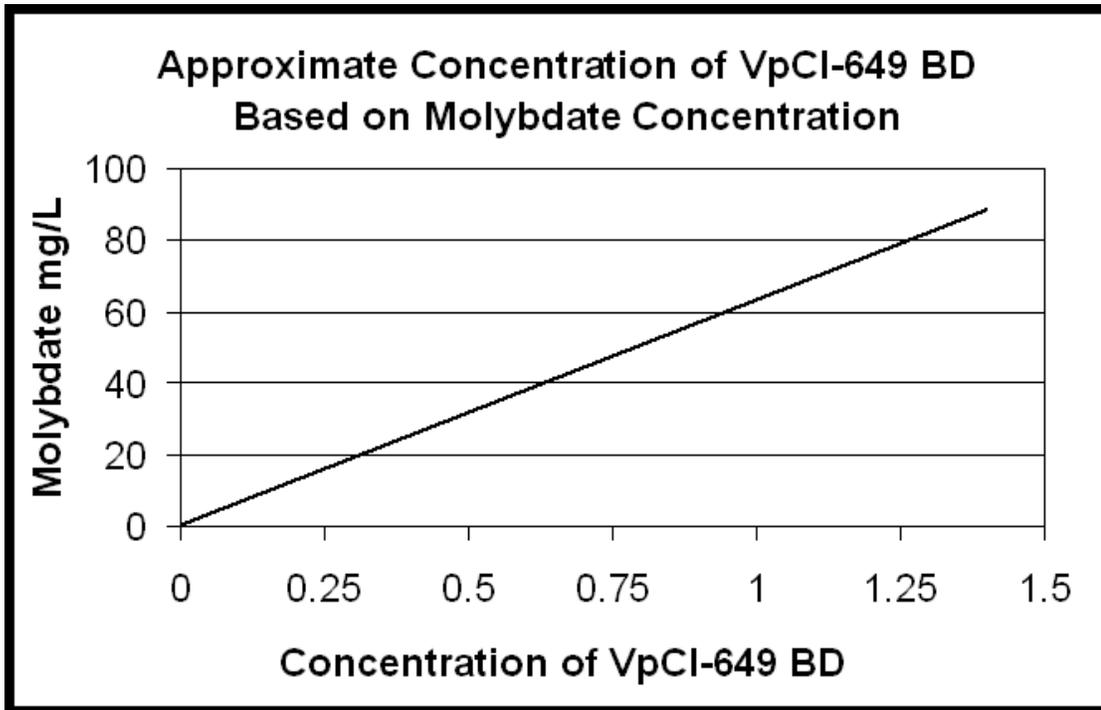
### PACKAGING

VpCI-649 BD is available in 5 gallon (19 liter) pails, 55 gallon (208 liter) drums, liquid totes and bulk. The products should be stored in tightly closed containers. Shelf life is 18 months.

### TYPICAL PROPERTIES

VpCI-649 BD	
Appearance	Clear amber liquid
Density	9.3-9.8 lb/gal (1.12-1.18 kg/l)
Type	Water-based
Non-volatile Content	44-48%
pH	9.3-9.8 (Neat)





**FOR INDUSTRIAL USE ONLY**  
**KEEP OUT OF REACH OF CHILDREN**  
**KEEP CONTAINER TIGHTLY CLOSED**  
**NOT FOR INTERNAL CONSUMPTION**  
**CONSULT MATERIAL SAFETY DATA SHEET FOR MORE INFORMATION**

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