



## Performance Biolubricants and Colloidal Cleaners

### **Tank & Pipe Cleaning Solution** (Sanitizer Optional)

#### **Features & Advantages**

WISE Tank & Pipe Cleaning Solution (TPCS) is a highly efficient and economical green alternative to the health and ecological hazards of caustic products like Trisodium Phosphate and Sodium Hydroxide. It is harmless to indoor air quality; it contains no VOC's or toxic vapors. Unlike caustic cleaners, the handling of this solution requires NO personal protective equipment (PPE).

The active ingredients in TPCS are nano-sized particulates called colloidal micelles that effectively cut through the carbon bonds in organic molecules and emulsify organic matter. Tartrates, proteins and other organic compounds are broken down, suspended and safely removed from wine tank, barrel and process equipment.

This product will save you time, trouble, and money! Here are the advantages:

- TPCS eliminates the need for several steps in the traditional process. We can clean and sanitize in one step, saving two water rinses and the labor to switch between the three ingredients normally used. We clean at 60-70°F, saving energy. One batch can be used for several tanks. We save the cost of protective clothing. We save on insurance costs as you eliminate toxic chemicals from your site.
- TPCS is recommended for all types of cleaning programs, ranging from manual to automated CIP (clean-in-place) systems. It effectively removes heavy tartrates (calcium tartrate, potassium tartrate, potassium bitartrate) as well as protein deposits from tank surfaces and process equipment. *Formulas are available for cleaning wine tanks, casks & pipes, dairy tanks (to remove milk stone), fermenting tanks and for removing beer stone, etc.*
- When the micelles in TPCS penetrate into tartrates and proteins, they encapsulate and break them into billions of little particles that constantly repel each other, making it impossible for them to stick back together or redeposit on a surface.
- This product is biodegradable, non-toxic, non-corrosive, non-hazardous, non-caustic, non-flammable, and hypoallergenic.

TPCS does not contain ozone-depleting substances, synthetics, terpenes, petroleum distillates, glycol ethers, caustics, builders & reagents, nor any California Proposition 65 Chemicals.

#### **Product Uses and Applications**

- Beverage Tanks / Pipes / Fermenters / Distillers
- Processing Equipment
- Specialized Storage Equipment Cleaning & Washing (such as barrels or casks)
- Stain Removal
- Pressure Washers

#### **Technology Highlights**

Micelles are sub-microscopic, electrically charged particles that, when activated in water, repel each other in a ceaseless random movement. Micelles in liquid solution measure only 2 to 4 nanometers in size, 50 to one hundred times smaller than the particles created from typical cleaners and detergents. This small size and their extreme surface area-to-volume ratio enable the micelles to penetrate and encapsulate complex carbon molecules, and emulsify organic matter. This highly effective Wise Green Chemistry product leaves a clean sanitary surface without endangering workers in the process, and without using chlorine or other toxic compounds that can damage product purity and flavor.



**Specifications**

**Tank & Pipe Cleaning Solution (cont'd)**

**100% Biobased Ingredients** – alkanolamines, amino acids, plant/vegetable extracts, nonionic surfactants, plant-based fatty acids and organic alcohol in a base of colloidal micelles.

**RADIOCARBON C-14** (5/10/04) USDA approved testing to meet requirements for product tested at 84 (range 83-91; N=8), Minimum biobased contact n=5.

**CLEAN AIR SOLVENT:** SCAQMD method 313-91 NO VAHAP, ODC or GWC detected.

**CARCINOGENICITY:** No ingredients listed by IARC, ACGIH, NTP or OSHA as a carcinogen.

- Flash Point:** None
- Odor:** Faint odor
- Boiling Point:** 214.4 F
- Freezing Point:** 28.0 F
- Specific Gravity:** 1.001
- Solubility:** 100%
- pH:** 9.7
- Appearance:** slightly viscous

**Suggested Dilutions**

This product must be diluted with water in order to work properly. Suggested dilution is 200 to 1. **Shake or agitate well before using.**

When using product, increased dwell time and agitation may be more effective than a more concentrated solution.

Wise TPCS is most effective when used in Clean-in-Place (CIP) systems.

TPCS is extremely effective in removing tartrates, proteins, yeasts and molds that accumulate inside tanks and pipes. These unwanted organic compounds can be completely removed from tank surfaces by using a diluted (1 part concentrate to 200 parts water) mixture. In a CIP system, the diluted cleaning solution should circulate throughout the tank for a minimum 45 minutes. For heavy duty cleaning\*, increase dwell time and/or agitation.

\*On heavily soiled surfaces, agitation may be necessary before all the residual organic matter is emulsified. Agitation speeds up results, as it facilitates the process that breaks down dirt and proteins and keeps them in the water solution.

**To Order**

Fax to 831-728-1753 or call 800-491-9473 for Customer Service  
Visit [www.wisesolutions.net](http://www.wisesolutions.net) or Email [sales@wisesolutions.net](mailto:sales@wisesolutions.net)

Available Size  
Container

Quantity (min.)

1 gal. <b>Bottle</b>	5 gal. <b>Pail</b>	55 gal. <b>Drum</b>	330 gal. <b>Tote</b>