



## Product Bulletin

*technicalservice@hubbardhall.com*

### EMERALD HD 2

2052092

11/11/08

**EMERALD HD 2** is a clear, heavy duty, mildly alkaline, low foam, general-purpose maintenance cleaner intended for industrial and institutional cleaning tasks.

The product is a water soluble, non-flammable product that is free of petroleum and chlorinated solvents, caustics, or phosphates.

**EMERALD HD 2** is formulated with a biodegradable surfactant system derived from sustainable resources offering superior wetting, emulsification, and dispersion. **EMERALD HD 2**, because of its unique formulation, will clean a variety of oils, fats, and particulate soils. It is a free rinsing product.

#### HOW AND WHERE TO USE

**EMERALD HD 2** may be used as a spray on, wipe or brush-on cleaner, or as a soak cleaner. It may be used with spray equipment, as it is a low foaming product.

**EMERALD HD 2** is a mildly alkaline material so always wear goggles, rubber gloves and protective clothing when working with the product. It is important to read and understand the material safety data sheet prior to working with **EMERALD HD 2**.

For light soils on painted surfaces, dilute 1 part **EMERALD HD 2** with 10 to 19 parts water, spray or wipe on and then immediately wipe off with clean rinse cloth. For heavier dirt, dilute 1 part to 5 parts of water and use as above.

For machinery cleaning, dilute 1 to 4 parts for light oil and soil and spray or wipe on as above. For heavy oil and soil removal, dilute 1 to 1. Use and rinse as above.

When using as a soak tank cleaner to clean metal parts, tools, filters, etc. Use 8 to 10 fl oz per gallon of water. Heating solution up to 180F will speed cleaning. Most metals are not harmed when using the dilutions recommended above. **EMERALD HD 2** is not recommended for use on aluminum substrates. **EMERALD HD 2** should be considered as a cleaner for the tougher soils encountered in industrial and automotive manufacturing plants.

**EMERALD HD 2** is a heavy duty alkaline cleaner. Most surfaces can be safely cleaned with when used as directed. Rinsing or wiping off should be done as quickly as possible. When using on painted surfaces keep contact times to a minimum.

#### CAUTION

**EMERALD HD 2** is a mildly alkaline product and should be handled accordingly. Avoid skin, eye and oral contact. Wear protective clothing, gloves and goggles when handling the product. Flush exposed areas immediately with clean, cold water. Contact a doctor immediately in case of eye contact or injury.

## EMERALD HD 2

### WARRANTY

THE QUALITY OF THIS PRODUCT IS GUARANTEED ON SHIPMENT FROM OUR PLANT IF THE USE RECOMMENDATIONS ARE FOLLOWED, DESIRED RESULTS WILL BE OBTAINED. SINCE THE USE OF OUR PRODUCTS IS BEYOND OUR CONTROL, NO GUARANTEE EXPRESSED OR IMPLIED IS MADE AS TO THE EFFECTS OF SUCH USE, OR THE RESULTS TO BE OBTAINED.