Since 1927, Arrow-Magnolia has helped people solve their cleaning and maintenance problems with the finest products available today.

### HIGHLIGHTS

- Hydrocarbons Eliminator
- Contains Seven Different Types of Bacteria
- Both Aerobic and Anaerobic

### **TYPICAL PROPERTIES**

Vapor Pressure: 31

Volatility: 78

Solubility: Yes

• Specific Gravity: 1.009

Vapor Density: N/A

● pH: 6.5

- Evaporation Rate:Slower than ether
- Physical Description:Clear liquid w/bland odor

### **SAFETY CAUTIONS**

- Keep out of reach of children.
- Use under normal atmospheric conditions in well-ventilated areas.
- Keep containers closed when not in use.
- Refer to MSDS for additional safety information.

# ARROW-MAGNOLIA International, Inc.

## LFS-1

### **DESCRIPTION:**

Bioremediation is the process whereby microbes are utilized to breakdown waste, in this case, hydrocarbons, into non-hazardous compounds such as carbon-dioxide and water. This can be accomplished in many ways, the most common being adding nutrients to stimulate the bacteria naturally present. This process has several drawbacks; the main one being the bacteria present may not be the best ones available to breakdown the hydrocarbons. Problems such as this can be eliminated by adding specific bacteria in extremely high concentrations along with nutrients to metabolize the hydrocarbons.

LFS-1 contains seven different types of bacteria that digest (metabolize) hydrocarbons. These bacteria are naturally occurring in nature and pose little or no health risk to the environment or other living organisms. They work in concert with each other to accomplish their task of metabolizing hydrocarbons.

Rates of metabolism vary greatly according to the type of hydrocarbon (chain length and complexity) and certain physical factors. Some bioremediation jobs are completed in as little as 30 days, while others take longer.

LFS-1 can also be used in bioreactors where hydrocarbon contaminated soils or waters are pumped into large vessels and aerated until hydrocarbon levels drop to acceptable levels.

### **DIRECTIONS:**

 $\ensuremath{\mathsf{LFS}}\xspace-1$  is applied directly using hand sprayers or automated grinding and mulching devices.

Initial Dose: One quart followed by one pint twice weekly.

**Use Rate:** 1/2 gallon treats one cubic yard of contaminated soil.

### **HMIS RATINGS**

Flammability

Health 0 0 Reactivity

Personal Protection

manufactured by:

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