# **LiquiFerm**® High Performance Fresh Liquid Yeast

LiquiFerm is a form of fresh liquid yeast for use in fuel ethanol fermentations. It contains a distillers' strain of *Saccharomyces cerevisiae* selected for high temperatures and alcohol concentrations that has been grown for high activity. It has also been stabilized to extend its shelf life and to maintain homogeneity.



# **CHARACTERISTICS**

Higher activity provides shorter lag times than conventional fresh or dry yeast.

- Enables direct pitching without a propagation step
- · Shorter propagation times
- · High budding rates
- · Rapid glucose uptake
- Stabilization enables longer shelf life compared to conventional fresh yeast
- Enhanced stress tolerance comparable to fresh cake yeast
- · Remains uniformly suspended without agitation
- Can be delivered through automated handling systems
- Yeast format is suited for enhanced fermentation through second pitch option



# **INGREDIENTS**

Fresh liquid yeast, water, and food-grade stabilizers.



## APPLICATIONS

LiquiFerm is intended for use in fuel ethanol fermentations.

- Ferments at temperatures up to  $40^{\circ}\text{C}$  ( $104^{\circ}\text{F}$ ) for short periods of time. However, temperatures of  $34^{\circ}\text{C}$   $37^{\circ}\text{C}$  ( $93^{\circ}\text{F}$   $98^{\circ}\text{F}$ ) are generally recommended.
- Ferments well at pH of 3.5 6.0
- Can achieve alcohol concentrations of more than 20% by volume (16% by weight) dependent on operational parameters.



## **PACKAGING**

Available in 1000 kg (2204.6 lb) totes or bulk 17000 - 20000 kg (37485 - 44100 lb)



# **DIRECTIONS FOR USE**

#### Direct Pitch:

LiquiFerm can be added directly to the fermentor at a rate of 10 - 25 g per hectoliter final volume (1 - 2 lb per 1000 US gal).

### Propagation:

Lower levels can be used if there is a propagation or conditioning stage before the fermentor. However shorter propagation times should be utilized.

#### Second Pitch:

LiquiFerm can be added directly to the fermentor at a rate of 1 - 2.5 g per hectoliter final volume (0.1 - 0.2 lb per 1000 US gal). Dosage time is dependant on process parameters.

Contact your Lallemand Biofuels & Distilled Spirits Technical Representative for more details.



# STORAGE & HANDLING

LiquiFerm should be kept refrigerated at  $1^{\circ}\text{C} - 4^{\circ}\text{C}$  (33.8°F - 39.2°F). Routinely check temperature upon receipt and during storage. When stored under these conditions, the product is stable for 4 months from the date of production.



## **REGULATORY & CERTIFICATIONS**

GRAS (Generally Recognized as Safe) IFN 7-05-520 (IFN: International Feed Number) Kosher CFIA Approved



## **PRECAUTIONS**

This product is not intended nor marketed for veterinary or human use.

Color may vary per batch, but in no way affects the performance of the product.



6120 WEST DOUGLAS AVENUE • MILWAUKEE, WI 53218 +1 866 342-7026 • +1 800 583-6484 www.lbds.com