Key to Successful Cane Juice Fermentation

Effycane is a specially designed Biotechnology based formulation for improved sugarcane juice / syrup alcohol fermentation.

Praj’s BioProducts Division specializes in development of innovative formulations that add ‘Economic Value’ to Biochemical processes. The expertise comes from:

- Vast experience of design and operation of Continuous, Fed-batch and Batch type fermentation processes
- Comprehensive knowledge of feedstocks composition and its effect on fermentation and yeast
Economic Benefit of Cane Juice Fermentation

Praj has global experience in cane juice based ethanol plant design and process operation. Cane Juice, being a highly perishable feedstock, is vulnerable to contamination. While it is rich in sugar, it is devoid of major nutrition required for yeast growth.

Cane Juice based alcohol fermentation requires extreme care due to:

- Perishable nature of juice
- Compositional variations based on cane variety, agronomy and handling procedures
- Lack of nutrients in feedstock for yeast growth and performance
- Severe problems of contamination

Effycane is a special product which enables high yield and stable cane juice fermentation process.

The product is a combination of specific Biochemicals and enzymes. The product is formulated after careful study of the parameters and requirements of process.

- Eliminates Contamination
- Generates excess fermentable sugar
- Provides yeast micro-nutrition

Advantages of Effycane

- Improves yeast metabolic rate
- Reduction in volatile acids in mash and by-product formation
- Increase in efficiency and alcohol yield by 5 to 15 liters / MT of cane juice depending on sugar content
- Increased alcohol concentration in mash by about 0.3 to 0.6%
- High rate of Yeast Growth & Metabolism
- Low Residual sugar loss
- Highly Improved Neutral Spirit quality
- Reductions in the quantity of Spent wash due to 70% recycle (If syrup is used as feedstock)
- Reduction in the fermentation hold-up time due to high yeast metabolic rate

Thus Effycane is a very effective and proven product formulation which improves the juice fermentation process & yields. Effycane is increasingly used in distilleries in South Central America & Asia.

Effycane Specifications:

Appearance: Free flowing power which readily goes in suspension with in water or mash

Dosage: Typically between 65 to 70 gram / kiloliter of distillery capacity (Total spirit production) or 5 ppm on wash volume basis

Packing: Easy to use laminated poly-pouches of custom-made sizes for your distillery plants

Shelf Life: Effycane can be stored at below 25°C for up to one year without loss of activity