

### **TECHNICAL DATA SHEET**

# BELLE SAISON BELGIAN SAISON-STYLE YEAST

Belle Saison is a Belgian-style ale yeast selected specifically for its ability to create Saison-style beers. Belle Saison lets brewers create Saison-styles easily and with all the expected characteristics noted for this classic style. Designed for warm-temperature fermentation true to traditional production methods, beers brewed with Belle Saison exhibit the "Farmhouse" flavors and aromas making for fruity, spicy and refreshing beer.



## MICROBIOLOGICAL PROPERTIES

Classified as a Saccharomyces cerevisiae var. diastaticus, a top fermenting yeast.

Typical Analysis of Belle Saison yeast:

Percent solids 93% - 97%

**Living Yeast Cells**  $\geq 5 \times 10^9$  per gram of dry yeast

Wild Yeast < 1 per 10<sup>6</sup> yeast cells

**Bacteria** < 1 per 10<sup>6</sup> yeast cells

Finished product is released to the market only after passing a rigorous series of tests \*According to the ASBC and EBC methods of analysis



# **BREWING PROPERTIES**

In Lallemand's Standard Conditions Wort at 20°C (68°F) Belle Saison yeast exhibits:

Vigorous fermentation that can be completed in 4 days

High Attenuation and Low Flocculation

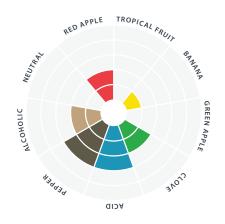
Aroma and flavor is traditional of Saisons with citrus and pepper notes.

The optimal temperature range for Belle Saison yeast when producing traditional styles is  $15^{\circ}\text{C}(59^{\circ}\text{F})$  to  $35^{\circ}\text{C}(95^{\circ}\text{F})$ 

Saccharomyces cerevisiae var. diastaticus strains are capable of utilizing some types of dextrins. Extra care should be taken to ensure proper cleaning procedures are in place to avoid any cross-contamination with other brews.

Fermentation rate, fermentation time and degree of attenuation are dependent on inoculation density, yeast handling, fermentation temperature and nutritional quality of the wort. If you have questions please do not hesitate to contact us at brewing@lallemand.com

# **FLAVOR & AROMA**



# **QUICK FACTS**

#### BEER STYLES

Saison

#### AROMA

citrus, pepper

#### ATTENUATION

high

#### FERMENTATION RANGE

15 - 35°C (59 - 95°F)

#### FLOCCULATION

low

#### ALCOHOL TOLERANCE

14% ABV

#### PITCHING RATE

50 - 100g/hL to achieve a minimum of 2.5 - 5 million cells/mL









# **BELLE SAISON BELGIAN SAISON-STYLE YEAST**



## **USAGE**

Depending on the desired gravity of the beer, among other variables, different yeast pitching rates should be applied. For Belle Saison yeast, pitching rate varies between 50 grams and 100 grams of active yeast to inoculate 100 liters of wort.

A pitching rate of 50g per 100L of wort to achieve a minimum of 2.5 million viable cells per ml.

A pitching rate of 100g per 100L of wort to achieve a minimum of 5 million viable cells per ml.

The pitching rate may be adjusted to achieve a desired beer style or to suit processing conditions.

Belle Saison has an ABV tolerance of 14%. For beers above 14%, the yeast will require nutrient addition such as 1g/hL of Servomyces.

Find your exact recommended pitching rate with our Pitch Rate Calculator in our Brewers Corner at www.lallemandbrewing.com



## REHYDRATION

Rehydration of Belle Saison is recommended for use, and will reduce osmotic stress on the yeast when rehydrated and pitched in liquid form. Rehydration guidelines are quite simple, and present a much lower risk of contamination than a starter, which is unnecessary with dried active yeast.

Sprinkle the yeast on the surface of 10 times its weight in clean, sterilized water at 30-35°C (86-95F). Do not use wort, or distilled or reverse osmosis water, as loss in viability will result. **DO NOT STIR.** Leave undisturbed for 15 minutes, then stir to suspend yeast completely, and leave it for 5 more minutes at 30-35°C. Then adjust temperature to that of the wort and inoculate without delay.

Attemperate in steps at 5-minute intervals of 10°C to the temperature of the wort by mixing aliquots of wort. Do not allow attemperation to be carried out by natural heat loss. This will take too long and could result in loss of viability or vitality.

Temperature shock, at greater than 10°C, will cause formation of petite mutants leading to long-term or incomplete fermentation and possible formation of undesirable flavors.

Belle Saison yeast has been conditioned to survive rehydration. The yeast contains an adequate reservoir of carbohydrates and unsaturated fatty acids to achieve active growth. It is unnecessary to aerate wort upon first use.

When using Lallemand Brewing Yeasts, you may repitch the yeast just as you would any other type of yeast according to your brewery's SOP for yeast handling.



# **STORAGE**

Belle Saison yeast should be stored dry below 10C° (50°F).

Belle Saison will rapidly lose activity after exposure to air. Do not use 500g or 11g packs that have lost vacuum. Opened packs must be re-closed, stored in dry conditions below 4°C, and used within 3 days. If the opened package is re-vacuum sealed immediately after opening, yeast can be stored for up to two weeks below 4°C.

Do not use yeast after expiry date printed on the pack.

CONTACT US

For more information, please visit us online at **www.lallemandbrewing.com** 

For any questions, you can also reach us via email at brewing@lallemand.com

