

TECHNICAL DATA SHEET

Article No. 9370

Lysine Medium, prepared plates

SPECIFICATION

Prepared plates, 90 mm. Solid and differential medium for the isolation, cultivation and enumeration of wild yeast in the brewery industry.

Color: Off-white
pH: 4.8 ± 0.2 at 25 °C

COMPOSITION IN G/L

Glucose	44.500
Agar	17.800
Lysine	1.000
Potassium dihydrogen phosphate	1.780
Magnesium sulfate	0.890
Calcium chloride	0.178
Sodium chloride	0.089
Inositol	0.020
Supplement	0.00815
Boric acid	8.9 µg
Biotin	2.0 µg
Folic ac.	1.0 µg
Potassium lactate	10.0 ml
Lactic acid 10%	1.0 ml

PACKAGING DETAILS

9370-20PLATES

20 prepared plates 90 mm

Content: 21 ± 2 ml

Packaging unit: 1 box with 2 packs of 10 plates/pack. Single Cellophane.



GUIDELINES

Description:

Most of the *Saccharomyces* strains employed in the brewery industry and other fermentative industries do not use lysine, whereas the wild strains do. This medium uses this property to differentiate both types of yeasts.

Technique:

For plate inoculation follow the laboratories standard methods or the applicable norms (spiral plating method, econometric methods, streak plating, dilution banks, spread plating with drigralsky rod etc).

Morris and Eddy recommended surface inoculation of a washed aliquote from the pitching yeast mass: 0,2 mL of a suspension of 10^7 cells/mL is recommended. The sample is incubated at 25 °C and examined daily, enumerating all the colonies that have grown (Lysine +). Results are referred to as wild cells per million of cells from the original inoculum.

When the results exceed 10,000 (10^4), it is considered that the wild yeast population may be dangerous.

MICROBIOLOGICAL CONTROL

Spiral Spreading: Practical range 50 - 100 CFU (Productivity).

Aerobic. Incubation at 22.5 ± 2 °C for 3-5 days (moulds and yeast).

Microorganism	Growth
<i>Sacch. cerevisiae carlsbergiensis</i> ATCC® 2700	Slight background film
<i>Pichia fermentans</i> ATCC® 10651	Good. White colonies.

Sterility control:

Incubation 48 hours at 30-35 °C and 48 hours at 20-25 °C: NO GROWTH.

Check at 7 days after incubation in same conditions.

BIBLIOGRAPHY

- ATLAS, R.M., L.C. PARKS (1993) Handbook of Microbiological Media. CRC Press, Inc. London.
- FOWELL, R.R. (1965) The identification of wild yeast colonies on Lysine Agar. J. appl. Bact. 28. 373-383.
- MORRIS, E.O., A.A. EDDY (1957) Method for the measurement of wild yeast infection in pitching yeast. J. Inst. Brew. 63(1)34-35.
- WALTERS L.S. & M.R. THISELTON (1953) The utilization of Lysine by yeasts. J- Inst. Brew. 59. 401-404.

STORAGE

2-14 °C

SHELF LIFE

3 months unopened from date of manufacture

updated: 07.12.2022

