

**CZAPEK DOX AGAR****TM 367**

semisynthetic medium for general cultivation of fungi

Composition

Ingredients	Gms/Ltr.
Sucrose	30.00
Agar	15.00
Sodium nitrate	2.00
Dipotassium phosphate	1.00
Magnesium sulphate	0.50
Potassium chloride	0.50
Ferrous sulphate	0.01

* Dehydrated powder, store in a dry place, in tightly-sealed containers at 24°C and protect from direct Sunlight.

Instructions for Use

Dissolve 49.00gms in 1000 ml of distilled water. Gently heat to boiling with gentle swirling and dissolve the medium completely. Sterilize by autoclaving at 15 psi (121°C) for 15 minutes. Cool to 45 - 50°C, mix well and dispense as desired.

Appearance: Light yellow coloured, clear to slightly opalescent

PH (at 25°C): 7.3 ± 0.2

Principle

CZAPEK DOX AGAR is used as semisynthetic medium for general cultivation of fungi. Fungi, including yeasts and filamentous species or moulds are ubiquitously distributed in nature. This medium is prepared according to the formula developed by Thom and Church. Fungi, including yeasts and filamentous species or moulds are ubiquitously distributed in nature. This medium contains sodium nitrate as the sole source of nitrogen. Czapek Dox Agar is recommended for isolation of *Aspergillus*, *Penicillium*, *Paecilomyces* and some other fungi with similar physiological requirements.

Magnesium sulphate, potassium chloride, ferrous sulphate serves as sources of essential ions. Sucrose serves as the sole source of carbon while sodium nitrate serves as the sole source of nitrogen. Dipotassium phosphate buffers the medium.

Interpretation

Cultural characteristics observed after inoculating the organisms and subsequent incubation at 25-30°C for 48 - 72 hours.



PRODUCT DATA SHEET

Microorganisms	ATCC	Inoculum (CFU)	Growth	Recovery
<i>Candida albicans</i>	10231	10 ³	Luxuriant	>=50%
<i>Aspergillus brasiliensis</i>	16404	10 ³	Luxuriant	>=50%
<i>Saccharomyces cerevisiae</i>	9763	10 ³	Luxuriant	>=50%

References

1. Thom and Church, 1926, The Aspergilli, 39.
2. Eaton A. D., Clesceri L. S. and Greenberg A. E., (Ed.), 1998, Standard Methods for the Examination of Water and Waste water, 20th Ed., American Public Health Association. Washington, D.C.