

# TM 1276 – PEPTONE YEAST DEXTROSE AGAR (CANTINO)

### **INTENDED USE**

For cultivation of aquatic fungi like Blastocladiella species.

### PRODUCT SUMMARY AND EXPLANATION

Peptone Yeast Dextrose Agar (Cantino) was formulated by Cantino for use in the cultivation of aquatic fungi like *Blastocladiella* species. These aquatic fungi grow well when a sugar like dextrose is present in the medium. Cantino reported that *Blastocladiella* grow luxuriantly under visible light illumination due to increased CO<sub>2</sub> fixation. Peptone Yeast Dextrose Agar (Cantino) is also recommended for the cultivation of *Eikenella corrodens*. *E. corrodens* is part of the resident microflora of mucous membrane surfaces in humans. Even though *E. corrodens* is generally regarded as organism of low virulence, it is usually involved in mixed bacterial infections, often with the viridans groups Streptococci and less frequently with various members of the *Enterobacteriaceae*.

### **COMPOSITION**

Ingredients	Gms / Ltr
Peptic digest of animal tissue	1.250
Yeast extract	1.250
Dextrose	3.000
Agar	20.000

### **PRINCIPLE**

This medium consists of Peptic digest of animal tissue and yeast extract, which supply the nitrogenous nutrients, vitamin B complex, peptides and trace ingredients for the growth of aquatic fungi and *E. corrodens*. Dextrose is the energy source.

# **INSTRUCTION FOR USE**

- Dissolve 25.5 grams in 1000 ml distilled water.
- Heat to boiling to dissolve the media completely.
- Sterilize by autoclaving at 15 psi pressure (121°C) for 15 minutes.
- Mix well and dispense as desired.

# **QUALITY CONTROL SPECIFICATIONS**

**Appearance of Powder** : Off-white to yellow homogeneous free flowing powder.

**Appearance of prepared medium**: Yellow coloured clear to slightly opalescent gel forms in Petri plates.

pH (at 25°C) :  $6.8 \pm 0.2$ 

## **INTERPRETATION**

Cultural characteristics observed after incubation.

Microorganism	ATCC	Inoculum (CFU/ml)	Growth	Recovery	Incubation Temperature	Incubation Period
---------------	------	----------------------	--------	----------	---------------------------	----------------------









Blastocladiella emersonii	22665	10-100	Luxuriant	>=70%	25-30°C	8 Days
Candida albicans	10231	10-100	Luxuriant	>=70%	25-30°C	8 Days
Eikenella corrodens	23834	50-100	Luxuriant	>=70%	25-30°C	8 Days
Saccharomyces cerevisiae	9763	10-100	Luxuriant	>=70%	25-30°C	8 Days

### **PACKAGING:**

In pack size of 100 gm bottles.

### **STORAGE**

Dehydrated powder, hygroscopic in nature, store in a dry place, in tightly-sealed containers between 25-30°C and protect from direct sunlight. Under optimal conditions, the medium has a shelf life of 4 years. When the container is opened for the first time, note the time and date on the label space provided on the container. After the desired amount of medium has been taken out replace the cap tightly to protect from hydration.

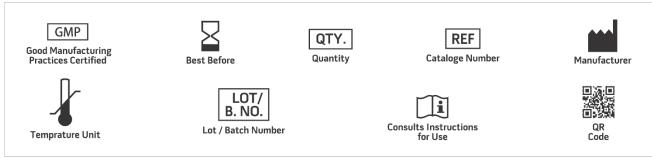
**Product Deterioration:** Do not use if they show evidence of microbial contamination, discoloration, drying or any other signs of deterioration.

### **DISPOSAL**

After use, prepared plates, specimen/sample containers and other contaminated materials must be sterilized before discarding.

### **REFERENCES**

- 1. Cantino E. C., 1961, Mycologia, 48: 225.
- 2. Recheigl Jr., (Ed.), 1978, Handbook Series in Nutrition and Food, Section G., Vol. III, CRC Press Inc.
- 3. Atlas R. M., 2004, Handbook of Microbiological Media, Lawrence C. Parks (Ed.), 3rd Edition, CRC Press.
- 4. Balows A., Truper H. G., Dworkin M., Harder W., Schleifer K. H., (Eds.), 1992, The Prokaryotes, 2nd Edi, Vol. III, SpringerVerlag.



NOTE: Please consult the Material Safety Data Sheet for information regarding hazards and safe handling Practices.

\*For Lab Use Only

Revision: 08 Nov., 2019







