

TM 2366 – THERMOACIDURANS BROTH

INTENDED USE

Recommended for detection of thermophilic/mesophilic aerobic and anaerobic aciduric spore formers and sterility testing for acid food.

PRODUCT SUMMARY AND EXPLANATION

B. coagulans is a soil microorganism that can also be found in canned tomato products and dairy products. Conditions favorable to multiplication of the organism can result in spoilage of the food product. *B. coagulans* is also referred to as *B. thermoacidurans*. *B. coagulans* is described as a facultative thermophile, that can grow at 20°C to 55°C and can also grow at pH levels between 5.0 to 7.0.

COMPOSITION

Ingredients	Gms / Ltr
Proteose peptone	5.000
Yeast extract	5.000
Dextrose (Glucose)	5.000
Dipotassium hydrogen phosphate	4.000

PRINCIPLE

Proteose peptone and yeast extract provide nitrogenous, carbonaceous compounds, vitamin B complex and other essential growth nutrients. Dipotassium phosphate buffers the medium. Dextrose acts as an energy source.

INSTRUCTION FOR USE

- Dissolve 19 grams in 1000 ml purified / distilled water.
- Heat if necessary to dissolve the medium completely.
- Sterilize by autoclaving at 15 psi pressure (121°C) for 15 minutes. Cool to 45-50°C.
- Mix well and dispense into tubes or flasks as desired.

QUALITY CONTROL SPECIFICATIONS

Appearance of Powder	: Cream to yellow homogeneous free flowing powder.
Appearance of prepared medium	: Yellow coloured clear to slightly opalescent solution
pH (at 25°C)	: 5.0±0.2

INTERPRETATION

Cultural characteristics observed after incubation.

Microorganism	ATCC	Inoculum (CFU/ml)	Growth	Incubation Temperature	Incubation Period
<i>Bacillus thermoacidurans</i>	8038	50-100	Luxuriant	55°C	18-48 Hours



PACKAGING:

In pack size of 100 gm and 500 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.

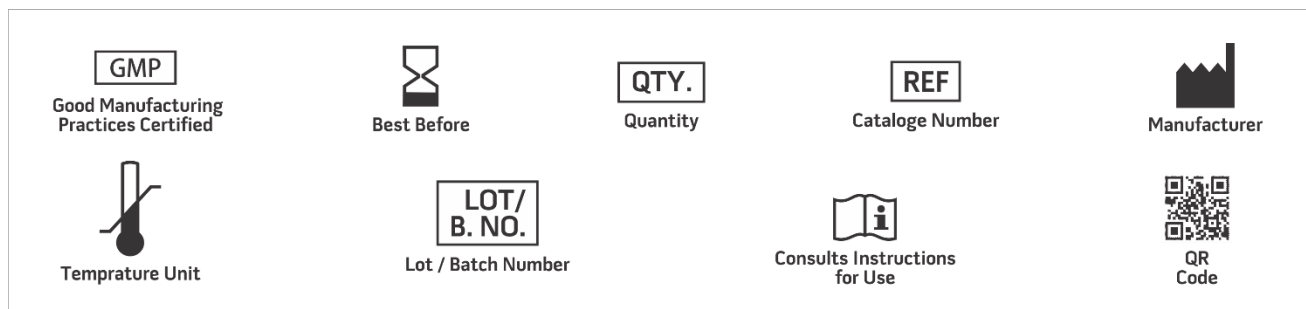
Product Deterioration: Do not use if they show evidence of microbial contamination, discoloration, drying or any other signs of deterioration.

DISPOSAL

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

REFERENCES

1. Becker M. E., Pederson C. S., 1950, J. Bacteriol., 459:717.
2. Salfinger Y., and Tortorello M.L. Fifth (Ed.), 2015, Compendium of Methods for the Microbiological Examination of Foods, 5th Ed., American Public Health Association, Washington, D.C.



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

***For Lab Use Only**
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