TMV 615 – PERFRINGENS AGAR BASE (T.S.C./S.F.P. AGAR BASE) (VEG.)

INTENDED USE

For presumptive identification and enumeration of *Clostridium perfringens* from food.

PRODUCT SUMMARY AND EXPLANATION

Perfringens Agar Base (T.S.C./S.F.P. Agar base) (VEG.) is developed by using Veg Hydrolysate No.1 and Veg extract which are free from BSE/TSE risks. Perfringens Veg Agar Base is the modification of Tryptose Sulphite Cycloserine Agar (TSC) which was originally formulated by Harmon et al for enumeration of *Clostridium perfringens* from food. Egg Yolk free TSC Agar has been documented as the most useful media for the quantitative recovery of *Clostridium perfringens* suppressing growth of almost all facultative anaerobes. Egg Yolk Free TSC Agar is used in pour plates. Perfringens Veg Agar Base like the conventional medium is superior to elevated temperature (46°C) MPN methods for enumeration of *Clostridium perfringens* spores.

COMPOSITION

Ingredients	Gms / Ltr
Veg hydrolysate No. 1	15.000
Veg extract	5.000
Papaic digest of soyabean meal	5.000
Yeast extract	5.000
Sodium metabisulphite	1.000
Ferric ammonium citrate	1.000
Agar	15.000

PRINCIPLE

The medium consists of Veg Hydrolysate No.1, papaic digest of soyabean meal, yeast extract, veg extract which provide nitrogenous compounds, carbon, sulphur, vitamin B complex and trace elements essential for *Clostridial* growth. Sodium metabisulphite and ferric ammonium citrate act as an indicator of sulphite reduction, indicated by black coloured colonies.

INSTRUCTION FOR USE

- Dissolve 23.5 grams in 475 ml purified/ distilled water.
- Heat to boiling to dissolve the medium completely.
- Sterilize by autoclaving at 15 psi pressure (121°C) for 15 minutes. Cool to 50°C.
- Add 25 ml of Egg Yolk Emulsion and rehydrated contents of 1 vial of S.F.P. Supplement / T.S.C. Supplement.
- Mix well before pouring into sterile Petri plates.

QUALITY CONTROL SPECIFICATIONS

Appearance of Powder : Yellow coloured, may have slightly greenish tinge, homogeneous, free flowing powder.

Appearance of prepared medium : Basal medium yields amber coloured slightly opalescent gel. With the addition of TSC Supplement an opaque gel forms while with addition of Egg Yolk Emulsion, yellow coloured opaque gel forms in petri plates.

pH (at 25°C) : 7.6 ± 0.2

INTERPRETATION

Cultural characteristics observed under anaerobic condition with added TSC Supplement/ S.F.P Supplement /Clostridium Perfringens Supplement and Egg Yolk Emulsion after incubation.

Microorganism	ATCC	Inoculum (CFU/ml)	Growth	Recovery	Sulphite Reduction	Incubation Temperature	Incubation Period
Clostridium perfringens	12924	50-100	Luxuriant	>=70%	Positive	35-37°C	18-48 Hours
Clostridium sordellii	9714	>=10^3	Inhibited	0%	-	35-37°C	18-48 Hours

PACKAGING:

In pack size of 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.

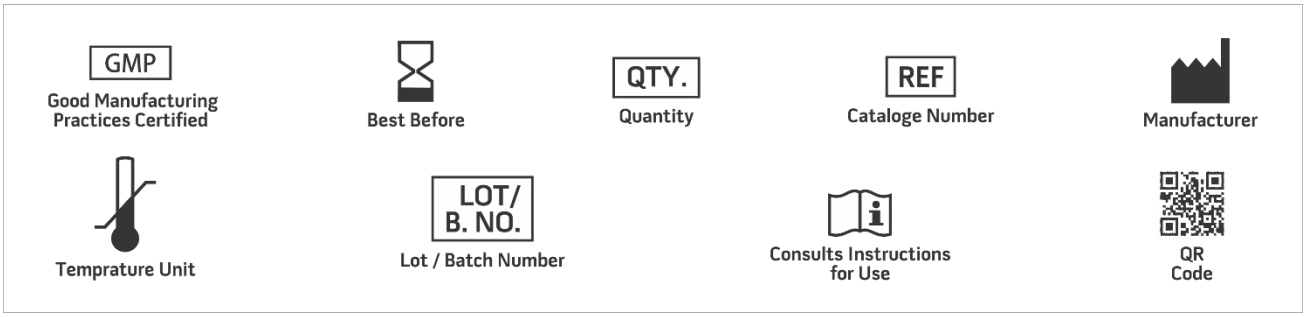
Product Deterioration: Do not use if they show evidence of microbial contamination, discoloration, drying or any other signs of deterioration.

DISPOSAL

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

REFERENCES

1. Harmon S.M., Kauttar D.A. and Peiler J.T., 1971, Appl. Microbiol., 22:688.
2. Harmon S.M., and Kauttar D.A., 1987, J. Asso. off Anal chem., 70:994.



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

***For Lab Use Only**

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