TSP 015GT - SOYABEAN CASEIN DIGEST AGAR PLATE W/ 1% GLYCEROL, 0.5% POLYSORBATE 80, 0.07% SOYA LECITHIN (γ-IRRADIATED) (TRIPLE PACK)

INTENDED USE

For determining efficiency of sanitization of containers, equipments, surfaces, water miscible cosmetics etc.

PRODUCT SUMMARY AND EXPLANATION

Soyabean casein Digest Agar Plate w/ Glycerol, Polysorbate 80 & Lecithin are RODAC (Replicate Organism Detection and Counting) plates recommended for the isolation of microorganisms from environmental surfaces. They are also used primarily to monitor microbial contamination, enumerate the number of microbial colonies growing on a variety of surfaces sanitized with quaternary ammonium compounds, and to assist in determining surface sanitation. The formulation of the basic medium (SCDA) is prepared according to the recommendations of the USP/EP/JP & supplemented with neutralizers.

COMPOSITION

Ingredients	Gms / Ltr
Agar	15.000
Casein enzymic hydrolysate	15.000
Glycerol	10.000
Sodium chloride	5.000
Papaic digest of Soybean meal	5.000
Polysorbate 80 (Tween 80)	5.000
Lecithin	0.700

PRINCIPLE

Medium contains Casein enzymic hydrolysate and papaic digest of soyabean meal which helps to provide nitrogenous compounds and other nutrients essential for microbial replication. Sodium chloride is added to maintain cellular osmotic equilibrium. Lecithin and polysorbate 80 are added to the formulation to neutralize germicidal or disinfectant residues. Neutralization of these residues reduces their inhibitory effect which ultimately results in lowering of microbial count. Quaternary ammonia compounds are neutralized by lecithin, while phenolic disinfectants and hexachlorophene are neutralized by polysorbate 80. Together, lecithin and polysorbate 80 neutralize ethanol. Glycerol helps in retention of moisture and serves as a carbon source. Agar is used as a solidifying agent.

INSTRUCTION FOR USE

Either streak, inoculate or surface spread the test inoculum aseptically on the plate. Alternatively, these plates can also be used as settle plates for environmental monitoring.

QUALITY CONTROL SPECIFICATIONS

Appearance	:	Light amber color, clear to slightly opalescent gel.
Quantity of Medium	:	15-18 ml of medium in 55 mm plates.
pH (at 25°C)	:	7.3± 0.2
Dose of irradiation:	:	15-25 kGy
Sterility Check	:	Passes release criteria

INTERPRETATION

Cultural characteristics observed after inoculation of 50-100 CFU, on incubation at 30- 35 °C for 18 – 24 hours for bacteria and at 20-25°C for ≤ 5 days for fungus.

Microorganism	ATCC	Inoculum (CFU/ml)	Growth	Recovery	Incubation Temperature	Incubation Period
Staphylococcus aureus	6538	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Staphylococcus aureus	25923	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Escherichia coli	8739	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Escherichia coli	25922	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Pseudomonas aeruginosa	9027	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Pseudomonas aeruginosa	27853	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Bacillus subtilis	6633	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Salmonella typhimurium	14028	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Klebsiella pneumoniae	13813	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Enterococcus faecalis	29212	50-100	Luxuriant	>=70%	30-35˚C	18-24 hours
Candida albicans	10231	50-100	Luxuriant	>=70%	20-25˚C	<=5 days
Aspergillus brasiliensis	16404	50-100	Luxuriant	>=70%	20-25˚C	<=5 days

PACKAGING:

Triple layered packing containing 5 No. of plates with one silica gel desiccant bag packed inside it.

STORAGE

On receipt, store the plates at 15–30 °C. Avoid freezing and overheating. Do not open until ready to use. Prepared plates stored in their original sleeve wrapping until just prior to use may be inoculated up to the expiration date and incubated for recommended incubation times. Allow the medium to warm to room temperature before inoculation.
Product Deterioration: Do not use plates if they show evidence of microbial contamination, discoloration, drying, cracking or other signs of deterioration.

DISPOSAL

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

REFERENCES

1. The United States Pharmacopoeia. 2009. Amended Chapters 61, 62 & 111, The United States Pharmacopoeial Convention Inc., Rockville, MD.
2. Hall and Hartnett, 1964, Public Hlth. Rep., 79:1021.
3. Richardson (Ed)., 1985, Standard Methods for the Examination of Dairy Products, 15th ed., APHA, Washington, D.C.

4. MacFaddin J.F., 1985, Media for Isolation-Cultivation-Identification-Maintenance of Medical Bacteria, Vol. I, Williams and Wilkins, Baltimore.
5. Brummer, 1976, Appl. Environ. Microbiol., 32:80.
6. Erlandson A.L. Jr and Lawrence C.A. 1953, Inactivating medium for hexachlorophene (G-11) types of compounds and some substituted phenolic disinfectants, Science, 118, 274-276.
7. Favero (Chairm), 1967, Biological Contamination Control Committee, a state of the art report., Am. Assoc. for contamination control

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

***For Lab Use Only**

Revision: 19th Oct. 2019