

## THTS 006– TRANSPORT SWABS W/ SOYBEAN CASEIN DIGEST MEDIUM W/ 6.5% NACL

### INTENDED USE

With 2.0ml TSB medium and one swab recommended for collection & transport of aerobic, anaerobic and fastidious organisms from nose, throat, axilla, perineum, groin for MRSA Screening

### PRODUCT SUMMARY AND EXPLANATION

The sole purpose of this medium is to maintain the viability of the microorganisms during time for collection to examine the specimen. Casein Digest Medium, a general purpose medium is known to support growth of bacterial species. Mueller Hinton Agar with 2% and 4% sodium chloride has been studied for isolating MRSA that are resistant to oxacillin.

Conventional methods for screening MRSA detects by inhibiting contaminants and selection based on antibiotic resistance. Direct plating methods are often followed but broth enrichment step prior to plating helps in good recovery of MRSA.

Staphylococci have the unique ability of growing on a high salt containing media. Therefore growth medium supplemented with high concentration of sodium chloride inhibits normal organisms other than Staphylococci. Enriched specimen can be then plated directly onto selective media or chromogenic media for direct identification of MRSA. MRSA strains are referred to as hetero-resistant because two subpopulations coexist within a culture. The resistant population usually grows much more slowly than the susceptible subpopulation leading to detection problems with traditional in vitro susceptibility test methods. Successful detection depends largely on promoting the growth of the resistant subpopulation, which favors lower temperatures, longer incubation and the presence of salt in the media.

### COMPOSITION

| Ingredients                    | Gms / Ltr |
|--------------------------------|-----------|
| Tryptone                       | 17.000    |
| Soyapeptone                    | 3.000     |
| Sodium chloride                | 6.500     |
| Dextrose                       | 2.500     |
| Dipotassium hydrogen phosphate | 2.500     |

### PRINCIPLE

The combination of Tryptone and soya peptone makes the medium nutritious by providing nitrogenous, carbonaceous substances, amino acids and long chain peptides for the growth of microorganisms. Dextrose/glucose serve as the carbohydrate source and dibasic potassium phosphate buffer the medium. Sodium chloride maintains the osmotic balance of the medium.

**Note:** The specimen should be inoculated in suitable medium as soon as possible and must not be kept at room temperature for more than 24 hours. Some contaminants may also grow, if specimen is kept for longer period in transport medium.

### INSTRUCTION FOR USE

1. Use the medium, provided along with the swab to collect and transport the microbiological sample.
2. Collect the sample with the sterile swab and insert the capped swab with the sample till the bottom of the medium. Tighten the cap firmly
3. The sample and viability of organism(s) will be maintained during transportation.



4. After the transportation, the specimen should be inoculated in proper medium as soon as possible.

### QUALITY CONTROL SPECIFICATIONS

|                        |   |                                      |
|------------------------|---|--------------------------------------|
| <b>Appearance</b>      | : | Light yellow colored medium in tubes |
| <b>pH (at 25°C)</b>    | : | 7.3 ±0.2                             |
| <b>Sterility Check</b> | : | Passes release criteria              |

### INTERPRETATION

Culture characteristics observed after incubation.

| Microorganism                        | ATCC  | Inoculum (CFU/ml) | Recovery on SCDA | Incubation Temperature | Incubation Period |
|--------------------------------------|-------|-------------------|------------------|------------------------|-------------------|
| <i>Staphylococcus aureus</i>         | 6538  | 50-100            | Luxuriant        | 35-37°C                | 18- 72 Hours      |
| <i>Staphylococcus aureus</i>         | 25923 | 50-100            | Luxuriant        | 35-37°C                | 18- 72 Hours      |
| <i>Staphylococcus epidermis</i>      | 12228 | 50-100            | Luxuriant        | 35-37°C                | 18- 72 Hours      |
| <i>Staphylococcus aureus</i><br>MRSA | 43300 | 50-100            | Luxuriant        | 35-37°C                | 18- 72 Hours      |

### PACKAGING:

In pack size of 50 No.

### STORAGE

On receipt, store ready-to-use disposable swabs in the dark at 10 to 25° C. Avoid freezing and overheating. The medium may be used up to the expiration date and incubated for the recommended incubation times.

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

### DISPOSAL

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

### REFERENCES

1. Clinical and Laboratory Standards Institute (CLSI). 2006. Methods for Dilution Antimicrobial Susceptibility Tests for Bacteria that Grow Aerobically: Approved Standard, 7th ed. M7- A7. CLSI, Wayne, PA
2. Koch P. K., 1942, Zentralbl. Bakteriol. Parasitenkd. Abt. Orig.149:122
3. Murray, P.R., E.J. Baron, J.H. Jorgensen, M.L. Landry, and M.A. Pfaller. 2007. Manual of Clinical Microbiology. Othd. ASM Press, Washington, D.C.



Lot / Batch Number



Temperature Unit



Manufacturer



Best Before



Certification of Good Manufacturing Practices



Catalogue No.



Authorized Representative



European Conformity



Consults Instructions for use :



QR Code



For In Vitro Diagnostic Use

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

**\*For Lab Use Only**  
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