

# **Contact Slide DG18 / DG18**

Flex Dip-slide with a selective medium for isolation and enumeration of osmophilic yeasts and xerophilic moulds.

Instructions For Use

ENGLISH

# INTENDED PURPOSE

Contact Slide DG18 / DG18 is a ready-to-use device with a medium coated onto a plastic support used for the monitoring of microbial contamination. This medium is not intended for use in the diagnosis of disease or other conditions in humans.

# DESCRIPTION

The slide is covered on both sides with DG (Dichloran Glycerol) 18 agar which is used for selective isolation and enumeration of viable osmophilic yeasts and xerophilic moulds. This medium conforms to the performance and formulation requirements of ISO 21527-2. Neutralizing agents are also included allowing organisms to grow even in the presence of residues of disinfectants.

TYPICAL FORMULA**	(g/litre)
Casein Enzymatic Digest	5.0
D-Glucose	10.0
Potassium Dihydrogenphosphate	1.0
Magnesium Sulfate	0.5
Dichloran	0.002
Chloramphenicol	0.1
Glycerol	220.0
Agar	15.0
Neutralizing	*
Final pH 5.6 ± 0.2 at 25°C	

\*Histidine 1.0 g/l; Lecithin 0.7 g/l; Tween 80 5.0 g/l; Sodium Thiosulfate 0.5 g/l. \*\*Adjusted and/or supplemented as required to meet performance specifications.

# METHOD PRINCIPLE

Enzymatic digest of casein provides amino acids, carbon, nitrogen, vitamins and minerals for organisms growth. Glucose is included as energy source. Monopotassium phosphate is a buffering agent. Magnesium sulfate provides divalent cations and sulfur. Dichloran is an anti-fungal agent incorporated into the medium to reduce colony diameters of spreading fungi. Chloramphenicol inhibits the growth of accompanying bacterial flora. Histidine, lecithin, polysorbate 80 (Tween 80) and sodium thiosulfate are neutralizers which have demonstrated their efficiency against multiple disinfectants containing various active agents, i.e. alcohol (70% ethanol or isopropyl alcohol), aldehyde, dichloroisocyanurate, glucoprotamine, hydrogen peroxide, peracetic acid, phenols, quaternary ammonium.

# **TEST PROCEDURE**

- 1. Unscrew and extract the slide from its cylindrical container. Avoid any contact with the agar surface.
- 2. Flex the cap forming a 90° angle and press each side of the slide firmly against the surface to be examined for 10 seconds. Alternatively, use a swab for sampling the area, afterwards roll the swab gently over the agar surface.
- 3. Reinsert the slide into its tube, screw it tight and incubate aerobically at  $25 \pm 1^{\circ}$ C for 5 to 7 days. It is recommended to incubate for up to 10 days if the presence of *Xeromyces bisporus* is suspected.

# **RESULTS INTERPRETATION**

Observe for fungal growth and count characteristic colonies/propagules after 2-day incubation and again at the end of the incubation period. Record the number of CFU per agar side.

The user is responsible for interpretation. It is recommended to establish alarm levels and levels that require user intervention, in order to take the most appropriate corrective action.

For surface testing, the colony count on each agar side can be calculated into CFU per cm<sup>2</sup> as follows: CFU (actual count) / 12.5 cm<sup>2</sup> = CFU/cm<sup>2</sup>

# **STORAGE**

Store at 10-25°C away from light. Do not use the product beyond its expiry date on the label or if product shows any evidence of contamination or any sign of deterioration.

#### **SHELF LIFE**

9 months.

#### QUALITY CONTROL

Appearance: Slightly opalescent, light amber.

# Expected Cultural Response:

Control strain		Incubation	Specification
Saccharomyces cerevisiae	WDCM 00058 (ATCC 9763)	5 days /	Good growth
Saccharomyces cerevisiae + 50 µl Aerodesin 2000	WDCM 00058 (ATCC 9763)	25 ± 1°C	
Wallemia sebi	WDCM 00182 (ATCC 42694)		
Escherichia coli	WDCM 00013 (ATCC 25922)		Total inhibition
Bacillus subtilis	WDCM 00003 (ATCC 6633)		

Please refer to the actual batch related Certificate of Analysis (CoA).

# **PERFORMANCE CHARACTERISTICS**

Performance testing of Contact slide DG18/DG18 was carried out using the QC strains listed above. The results obtained met the established criteria.

## LIMITATIONS

Invalid results can be caused by poor sample quality, improper sample collection, improper transportation, improper laboratory processing, or a limitation of the testing technology. The operator should understand the principles of the procedures, including its performance limitations, in advance of operation to avoid potential mistakes.

Due to nutritional variation, some strains may be encountered that grow poorly or fail to grow on this medium.

#### WARNING AND PRECAUTIONS

**For professional use only.** Operators must be trained and have certain experience. Please read the instructions carefully before using this product. Reliability of assay results cannot be guaranteed if there are any deviations from the instructions in this document.

Consult the Safety Data Sheet (SDS) for information regarding hazards and safe handling practices.

#### **DISPOSAL OF WASTE**

Disposal of waste must be carried out according to national and local regulations in force.

#### BIBLIOGRAPHY

See the references at the end of this document.

#### TABLE OF SYMBOLS

See the table of symbols at the end of this document.

#### **ORDER INFORMATION**

Product	Packaging	Ref
Contact Slide DG18 / DG18	20 slides	525732

#### **Revision History**

Revision	Release Date	Change Summary
0	2024-06-28	Document creation

This IFU document and the SDS are available from the online Support Center: liofilchem.com/ifu-sds

# **REFERENCES**

- 1. EN ISO 11133:2014+Amd1:2018. Microbiology of food, animal feed and water -- Preparation, production, storage and performance testing of culture media.
- ISO 18593:2018. Microbiology of the food chain -- Horizontal method for surface sampling. 2.
- ISO 21527-2:2008. Microbiology of food and animal feeding stuffs -- Horizontal method for the 3. enumeration of yeasts and moulds. Part 2: Colony Count Technique in products with water activity less than or equal to 0,95.
- Beuchat and Cousin (2001) In Downes and Ito (ed.). Compendium of methods for the microbiological 4. examination of foods, 4th ed. American Public Health Association. Washington, D.C.
- 5. U.S. Food and Drug Administration (1995) Bacteriological analytical manual, 8th ed. AOAC International, Gaithersburg, Md.
- Banks, Board and Paton (1985) Lett. Appl. Microbiol. 1:7. 6.
- 7. King, Hocking and Pitt (1979) Appl. Environ. Microbiol. 37:959.

LOT	Batch code
REF	Catalogue number
	Manufacturer
	Use by
	Fragile, handle with care
X	Temperature limitation
Σ	Contains sufficient for <n> tests</n>
-1	Consult instructions for use
$\overline{\mathbb{X}}$	Do not reuse
淡	Keep away from sunlight

# **TABLE OF SYMBOLS**



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