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OXOID QUALITY ASSURANCE PRODUCT SPECIFICATION		
DEMI-FRASER BROTH (WITHOUT FERRIC AMMONIUM CITRATE) CM1053		

DEMI-FRASER BROTH (WITHOUT FERRIC AMMONIUM CITRATE)

CM1053

Typical Formula*

	grams per litre
Proteose peptone	5.0
Tryptone	5.0
'Lab-Lemco' powder	5.0
Yeast extract	5.0
Sodium chloride	20.0
Di-sodium hydrogen phosphate (anhydrous)	12.0
Potassium dihydrogen phosphate	1.35
Aesculin	1.0
Lithium chloride	3.0
Nalidixic acid	0.01
Acridine hydrochloride	0.0125

* adjusted as required to meet performance standards

Directions

Dissolve 57.4g in 1 litre of distilled water. Mix well and distribute into final containers. Sterilize by autoclaving at 121°C for 15 minutes.

If the addition of ferric ammonium citrate is required, cool to 50°C and add 10ml of a 5% w/v solution prepared in the following way; dissolve 5g of ferric ammonium citrate in 100ml of distilled water and filter sterilize through a 0.2µm filter.

Physical Characteristics

Straw, free-flowing powder

Colour on reconstitution - straw/green with a blue hue

Moisture level - less than or equal to 7%

pH - 7.2 ± 0.2 at 25°C

Clarity - clear

Microbiological Tests Using Optimum Inoculum Dilution

Control Medium: Columbia Blood Agar

Reactions after incubation at 30°C for 24 hours

Inoculate 10ml quantities of medium to achieve 1-10 colony-forming units/ml (cfu/ml) of *Listeria* spp. Incubate broths at 30°C for 24 hours. Subculture onto Listeria Oxford Medium (CM0856 and SR0140) and incubate plates at 37°C for 24-48 hours.

Listeria monocytogenes ATCC®7644

Listeria monocytogenes ATCC®13932

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A satisfactory result is represented by recovery of positive strains equal to or greater than a 2 log(10) increase.

Inoculate 10ml quantities of medium to achieve 10-100 cfu/ml. Incubate broths at 30°C for 24 hours. Subculture onto Listeria Oxford Medium (CM0856 and SR0140) and incubate plates at 37°C for 48 hours.

<i>Bacillus cereus</i>	ATCC®10876	No growth
<i>Enterococcus faecalis</i>	ATCC®29212	No growth

Negative strains are inhibited.

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Revision History

Section / Step	Description of Change	Reason for Change	Reference
Entire Document	Update to new document format and correction of typographical/minor errors. Addition of Control Media and Result Criteria. Correction of result for <i>Listeria monocytogenes</i> from 3 log(10) to 2 log(10) increase.	Change control	BT-CC-1931 & BT-CC-2277