OXOID QUALITY ASSURANCE PRODUCT SPECIFICATION

LEGIONELLA AGAR BASE CM1203

LEGIONELLA CYE AGAR BASE **CM1203**

Typical Formula*

Activated charcoal	grams per litre	2.0
Yeast extract		10.0
α-ketoglutarate, monopotassium salt		0.5
ACES buffer (N-2-acetamido-2-aminoethanesulfonic acid)		10.0
Agar		14.0

*adjusted as required to meet performance standards

Directions

Suspend 18.25g in 466ml of distilled water and mix thoroughly, before immediately pH adjusting by adding 8.8ml 2M KOH (=0.99g potassium hydroxide) and remix. Bring gently to the boil to dissolve completely. Sterilize by autoclaving at 121°C for 15 minutes (mix just before autoclaving to reduce sediment settling and burning). Cool to 45-50°C mixing well to re-suspend sediment. Aseptically add 25ml of Legionella Growth Supplement (BCYE) (SR0251C) or Legionella BCYE w/o Cysteine Supplement (SR0253A) reconstituted as directed. Mix well and pour into sterile Petri dishes. This medium may be supplemented with one of the following selective supplements: SR0252 (GVPC), SR0254 (BMPA) or SR0255 (MWY) – please refer to the Thermo Fisher Scientific website for more details.

Physical characteristics

Black, free-flowing powder
Colour on reconstitution – black
pH - 6.6 to 6.9 at 25°C
Clarity – opaque
Gel strength – firm, comparable to 14g/litre of agar

OXOID QUALITY ASSURANCE PRODUCT SPECIFICATION

LEGIONELLA AGAR BASE CM1203

Microbiological Tests using Optimal Inoculum Dilution

Control Media: Legionella BCYE Medium or Tryptone Soya Agar, where appropriate

Tested in accordance with ISO11731:2017

Reactions after incubation at 36 ± 2°C for 3-5 days in a humid atmosphere

Tested with the addition of Legionella BCYE Growth Supplement SR0251C

Medium is challenged with 50-120 colony-forming units

Inoculation using surface plate technique

Legionella pneumophila	ATCC®33152	WDCM00107	1-5mm grey/white-bluish colonies, negative fluorescence
Legionella anisa	ATCC®35292	WDCM00106	0.25-3mm grey/white-bluish colonies, weak or positive fluorescence
**Fluoribacter bozemanae*	ATCC®33217		1-5mm grey/white-bluish colonies, positive fluorescence

*CLSI M22 A3 quality control requirements

A satisfactory result is represented by recovery of positive strains equal to or greater than 70% of the control medium.

Reactions after incubation at 36 ± 2°C for 4-5 days in a humid atmosphere

Medium is challenged with 50-120 colony-forming units

Inoculation using membrane filtration technique

Legionella pneumophila	ATCC®33156	WDCM00180	0.25-3mm grey/white-bluish colonies, negative fluorescence

A satisfactory result is represented by recovery of positive strains equal to or greater than 70% of the control medium.

OXOID QUALITY ASSURANCE PRODUCT SPECIFICATION

LEGIONELLA AGAR BASE CM1203

Tested with the addition of Legionella BCYE Growth Supplement SR0251C and Legionella (GVPC) Selective Supplement SR0252E

Reactions after incubation at 36 ± 2°C for 3-5 days in a humid atmosphere

Medium is challenged with 50-120 colony-forming units

Inoculation using surface plate technique

Legionella pneumophila	ATCC®33152	WDCM00107	1-5mm grey/white-bluish colonies, negative fluorescence
Legionella anisa	ATCC®35292	WDCM00106	0.25-3mm grey/white-bluish colonies, weak or positive fluorescence
**Fluoribacter bozemanae*	ATCC®33217		1-5mm grey/white-bluish colonies, positive fluorescence

*CLSI M22 A3 quality control requirements

A satisfactory result is represented by recovery of positive strains equal to or greater than 50% of the control medium.

Reactions after incubation at 36 ± 2°C for 4-5 days in a humid atmosphere

Medium is challenged with 50-120 colony-forming units

Inoculation using membrane filtration technique

Legionella pneumophila	ATCC®33156	WDCM00180	0.25-3mm grey/white-bluish colonies, negative fluorescence

A satisfactory result is represented by recovery of positive strains equal to or greater than 50% of the control medium.

Reactions after incubation at 36 ± 2°C for 3 days

Inoculation using surface plate technique

Medium is challenged with 1E+04 to 1E+06 colony-forming units

Enterococcus faecalis	ATCC®19433	WDCM00009	No growth
Enterococcus faecalis	ATCC®29212	WDCM00087	No growth or pinpoint–1mm white/grey colonies
Escherichia coli	ATCC®25922	WDCM00013	No growth or 0.25-5mm white/grey colonies

Escherichia coli	ATCC®8739	WDCM00012	No growth or 0.25-5mm white/grey colonies

Medium is challenged with 1E+03 to 1E+05 colony-forming units

Pseudomonas aeruginosa	ATCC®27853	WDCM00025	No growth or 1-2mm straw/grey colonies

Negative strains are inhibited or shall produce at least a 2 log(10) reduction when compared to the control medium. For *Enterococcus faecalis* ATCC®29212, a satisfactory result is represented by recovery of less than 10 cfu.

Reactions after incubation at 36 ± 2°C for 3-4 days

Inoculation using stab technique

Aspergillus brasiliensis	ATCC®16404	No growth or minimal growth

Aspergillus brasiliensis ATCC®16404 shall be inhibited or produce minimal growth.

OXOID QUALITY ASSURANCE PRODUCT SPECIFICATION

LEGIONELLA AGAR BASE CM1203

Revision History

Section / Step	Description of Change	Reason for Change	Reference
Entire document	New document	N/A	N/A
Typical formulation	Correction of yeast extract and agar grams per litre	Change control	BT-CC-2823
Directions	Correction to volume of water from 465mL to 466mL	Change control	BT-CC-2823