
	Document ID:	TDS-MCL-033-500ML	Version:	006
	Date of Issue:	10-JAN-2023	Approved by:	Dr. Iman Kamranfar
	Review Date:	10-JAN-2025	Signature:	
	Title:	TECHNICAL DATASHEET		

Medium 199 Medium



Filtration/ Treatment	With Earle's Salts and L-Glutamine
Product Code	MCL-033-500ML
Shelf Life	12 months from DOM
Storage Temperature	+2 to +8°C
Shipping Temperature	ambient

QC Specifications

Physical and Chemical Analysis	Method	Specifications	Units
Appearance	Visual	Clear, red solution	n/a
pH at RT	Electronic pH Meter	6.9 - 7.5	n/a
Osmolality	Osmometer	260 - 340	mOsm/kg
Endotoxin	LAL Kinetic	≤ 1.0	EU/ml
Sterility			
Aerobic Bacteria	Internally Validated	Not detected	n/a
Anaerobic Bacteria	Internally Validated	Not detected	n/a
Fungi (Yeast & Mold)	Internally Validated	Not detected	n/a
Mycoplasma	qPCR	Not detected	n/a
Cell culture			
Cell growth promotion	Passage test	3 passages	n/a
Viability	Trypan Blue Exclusion	≥75%	n/a

Formulation

Amino Acids	CAS number	Concentration (mg/L)
Glycine	56-40-6	50.00
L-Alanine	56-41-7	25.00
L-Arginine, Hydrochloride	1119-34-2	70.00
L-Aspartic Acid	56-84-8	30.00
L-Cysteine, Hydrochloride, Monohydrate	7048-04-6	0.11
L-Cystine, Dihydrochloride	30925-07-6	26.00
L-Glutamine	56-85-9	100.00
L-Histidine, Hydrochloride, Monohydrate	5934-29-2	21.88
L-Hydroxyproline	51-35-4	10.00
L-Isoleucine	73-32-5	40.00
L-Leucine	61-90-5	60.00
L-Lysine, Hydrochloride	657-27-2	70.00
L-Methionine	63-68-3	15.00
L-Phenylalanine	63-91-2	25.00
L-Proline	147-85-3	40.00
L-Serine	56-45-1	25.00
L-Threonine	72-19-5	30.00
L-Tryptophan	73-22-3	10.00
L-Tyrosine, Disodium, Dihydrate	122666-87-9	57.87
L-Valine	72-18-4	25.00
Vitamins		
(+/-) a-Tocopherol Phosphate, Disodium Salt	60934-46-5	0.01
Biotin	58-85-5	0.01
Choline Chloride	67-48-1	0.50
D-Calcium Pantothenate	137-08-6	0.01
D-Ribose	50-69-1	0.50
Ergocalciferol	50-14-6	0.10

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Folic Acid	59-30-3	0.01
L-Ascorbic Acid	50-81-7	0.05
Menadione Sodium Bisulfite	6147-37-1	0.02
Myo-Inositol	87-89-8	0.05
Niacinamide	98-92-0	0.03
Nicotinic Acid	59-67-6	0.03
para-Aminobenzoic Acid	150-132-0	0.05
Pyridoxine, Hydrochloride	58-56-0	0.05
Riboflavin	83-88-5	0.01
Thiamine, Hydrochloride	67-03-8	0.01
Vitamin A, Acetate	127-47-9	0.14
Other Components		
2-Deoxy-D-Ribose	533-67-5	0.50
Adenine Sulfate, Dihydrate	6509-19-9	12.13
Adenosine 5'-Monophosphate, Monohydrate	18422-05-4	0.20
Adenosine 5'-Triphosphate, Anhydrous	56-65-5	1.00
Cholesterol	57-88-5	0.20
D-Glucose, Anhydrous	50-99-7	1000.00
Glutathione, Reduced	70-18-8	0.05
Guanine HCl	635-39-2	0.30
Hypoxanthine, Sodium	45738-97-4	0.35
Phenol Red, Sodium Salt	34487-61-1	20.00
Polysorbate 80	9005-65-6	20.00
Sodium Acetate, Anhydrous	127-09-3	50.00
Thymine	65-71-4	0.30
Uracil	66-22-8	0.30
Inorganic Salts		
Calcium Chloride, Anhydrous	10043-52-4	200.00
Ferric Nitrate, Nonahydrate	7782-61-8	0.72
Magnesium Sulfate, Anhydrous	7487-88-9	97.70
Potassium Chloride	7447-40-7	400.00
Sodium Bicarbonate	144-55-8	2200.00
Sodium Chloride	7647-14-5	6800.00
Sodium Phosphate, Monobasic, Monohydrate	10049-21-5	140.00
Xanthine, Monosodium Salt	1196-43-6	0.34

Product Use: This product is intended for laboratory use only.