

L1 Medium

(Marine dinoflagellates)

Stocks

(1) Trace elements

There are 11 chemicals. Prepare Primary stock solutions first. Add first two chemicals separately in 500ml/dH₂O, allowing each to completely dissolve before adding the primary stocks (3-11) in order:

	Chemical	Primary stock solutions 10ml dH ₂ O	Amount/Volume for <u>500 ml</u> working stock solution
1	Na ₂ EDTA·2H ₂ O	-	2.18 g
2	FeCl ₃ ·6H ₂ O	-	1.575 g
3	CuSO ₄ ·5H ₂ O	0.0245 g	1.5 ml
4	Na ₂ MoO ₄ ·2H ₂ O	0.199 g	0.5 ml
5	ZnSO ₄ ·7H ₂ O	0.22 g	0.5 ml
6	CoCl ₂ ·6H ₂ O	0.1 g	0.5 ml
7	MnCl ₂ ·4H ₂ O	1.8 g	0.5 ml
8	H ₂ SeO ₃	0.026 g	0.5 ml
9	NiSO ₄ ·6H ₂ O	0.027 g	0.5 ml
10	Na ₃ VO ₄	0.0184 g	0.5 ml
11	K ₂ CrO ₄	0.0194 g	0.5 ml

	Per Litre
(2) Vitamin mix	
Cyanocobalamin (Vitamin B ₁₂)	0.0005 g
Thiamine HCl (Vitamin B ₁)	0.1 g
Biotin	0.0005 g
(3) NaNO ₃	75 g
(4) NaH ₂ PO ₄ ·2H ₂ O	5.65 g

Add **1 ml** of each of the 4 stock solutions to **1 litre** of filtered natural seawater. Adjust pH to **8.0** with 1M NaOH or HCl. Sterilise by autoclaving for 15 minutes at 15 psi and use when cooled to room temperature.

Reference

Guillard and Hargraves (1993)

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